



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

**SPECIAL PROVISIONS
PROPOSAL
CONTRACT AND BOND**

FOR

**SAND ISLAND ACCESS ROAD
TRUCK WEIGH STATION
FEDERAL-AID PROJECT NO. NH-064-1(010)R
DISTRICT OF HONOLULU
ISLAND OF OAHU
FY 2025**

NOTICE TO BIDDERS
Hawaii Revised Statutes (HRS),
Chapter 103D

The receiving of bids for **SAND ISLAND ACCESS ROAD TRUCK WEIGH STATION, DISTRICT OF HONOLULU, ISLAND OF OAHU, FEDERAL-AID PROJECT NO. NH-064-1(010)R**, will begin as of the HiePRO Release Date. Bidders shall register and submit complete bids through HiePRO only. Refer to the following HiePRO link for important information on Vendor Registration: <https://hiepro.hawaii.gov/welcome.html>.

The solicitation plans, specifications, proposal, and additional documents designated or incorporated by reference shall be available in HiePRO.

HiePRO OFFER DUE DATE AND TIME is February 4, 2026, at 2:00 p.m., Hawaii Standard Time (HST). **Bidders shall submit and upload the complete proposal to HiePRO prior to the offer due date and time. Proposals received after said due date and time shall not be considered. Any additional support documents explicitly designated as confidential and/or proprietary shall be uploaded as a separate file to HiePRO. Bidders shall not include confidential and/or proprietary documents as part of their proposal. The record of each bidder and their respective proposal shall be open to public inspection. FAILURE TO UPLOAD THE PROPOSAL TO HiePRO SHALL BE GROUNDS FOR REJECTION.**

The scope of work consists of constructing a new truck weigh station along the side of the northbound lane of Sand Island Access Road between the Kapalama Terminal Entrance and Road No. 2. The estimated cost of construction is between \$2,300,000.00 and \$2,800,000.00.

To be eligible for award, bidders shall possess a valid State of Hawaii General

Engineering “A” license **prior to the award of contract.**

A virtual pre-bid conference is scheduled for January 14, 2026, at 10:00 a.m., HST. Interested bidders shall contact Amy Sunahara, Project Manager, directly at amy.my.sunahara@hawaii.gov no later than five working days prior to the scheduled pre-bid conference to receive the meeting invitation. All prospective bidders and/or their respective representatives are encouraged to attend, however, attendance is not mandatory. All information presented at the pre-bid conference shall be provided for clarification and information only. Any amendments to the solicitation shall be made by formal addendum and posted in HlePRO.

All Request for Information (RFI) questions and Substitution Requests shall be submitted in HlePRO **no later than January 16, 2026, at 2:00 p.m., HST.** RFI questions received after the stated deadline shall not be addressed. Substitution Requests received after the stated deadline shall not be considered. Verbal RFI(s) shall not receive a response. All responses to RFI questions shall be provided for clarification and information only and issued by formal addendum. Any amendments to the solicitation shall be made by formal addendum and posted in HlePRO.

If there is a conflict between the solicitation and information stated in the pre-bid conference, the meeting minutes, and/or the responses to RFI questions, the solicitation shall govern and control, unless as amended by formal addendum.

Campaign contributions by State and County Contractors. Contractors are hereby notified of the applicability of HRS § 11-355 which states that campaign contributions are prohibited from specified State or county government contractors during the term of the contract if the contractors are paid with funds appropriated by a legislative body. For more information, contact the Campaign Spending Commission at (808) 586-0285.

Protests. Any protest of this solicitation shall be submitted in writing to the Director of

Transportation, in accordance with HRS § 103D-701 and Hawaii Administrative Rules § 3-126.

The Equal Employment Opportunity Regulations of the Secretary of Labor implementing Executive Order 11246, as amended, shall be complied with on this project.

The U.S. Department of Transportation Regulation entitled “Nondiscrimination in Federally Assisted Programs of the U.S. Department of Transportation”, Title 49, Code of Federal Regulations (CFR), Part 21, is applicable to this project. Bidders are hereby notified that the Department of Transportation shall affirmatively ensure that the contract entered into pursuant to this advertisement shall be awarded to the lowest responsible bidder without discrimination on the grounds of race, color, national origin, or sex (as directed by 23 CFR Part 200).

Disadvantaged Business Enterprise (DBE). The U.S. Department of Transportation Regulations entitled "Participation by Disadvantaged Business Enterprise in Department of Transportation Financial Assistance Programs", Title 49, CFR, Part 26, is applicable to this project. Bidders are hereby notified that the Department of Transportation shall enforce compliance with the applicable requirements of the Disadvantaged Business Enterprise program with respect to this project.

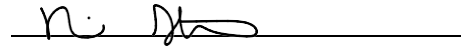
Bidders shall read the following included in the solicitation:

1. “CIVIL RIGHTS COMPLIANCE AND DISADVANTAGED BUSINESS
ENTERPRISE SPECIAL PROVISIONS”

Driving While Impaired (DWI) Education. The Hawaii Department of Transportation (HDOT) encourages all organizations contracted with HDOT to have an employee education program preventing DWI. DWI is defined as operating a motor vehicle while impaired by alcohol or other legal or illegal substances. HDOT promotes this type of program to accomplish our mission to provide a safe environment for motorists, bicyclists, and pedestrians utilizing our State highways, and expects its contractors to do so as well.

For additional information, contact Amy Sunahara, Project Manager, by phone at (808) 692-7575 or by email at amy.my.sunahara@hawaii.gov.

The State reserves the right to reject any or all proposals and to waive any defects in said proposals in the best interest of the public.

A handwritten signature in black ink, appearing to read 'R. Shishido', is written over a solid horizontal line.

ROBIN K. SHISHIDO
Deputy Director of Transportation for Highways

HlePRO RELEASE DATE: January 7, 2026

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Performance Bond

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Labor and Material Payment Bond

Disclosure of Lobbying Activities
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Form WH-348

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INSTRUCTIONS FOR CONTRACTOR'S LICENSING

"A" general engineering contractors and "B" general building contractors are reminded that due to the Hawaii Supreme Court's January 28, 2002 decision in Okada Trucking Co., Ltd. v. Board of Water Supply, et al., 97 Haw. 450 (2002), they are prohibited from undertaking any work, solely or as part of a larger project, which would require the general contractor to act as a specialty contractor in any area where the general contractor has no license. Although the "A" and "B" contractor may still bid on and act as the "prime" contractor on an "A" or "B" project (*See, HRS § 444-7 for the definitions of an "A" and "B" project.*), respectively, the "A" and "B" contractor may only perform work in the areas in which they have the appropriate contractor's license (*An "A" or "B" contractor obtains "C" specialty contractor's licenses either on its own, or automatically under HAR § 16-77-32.*). The remaining work must be performed by appropriately licensed entities. It is the sole responsibility of the contractor to review the requirements of this project and determine the appropriate licenses that are required to complete the project.

**NOTICE OF REQUIREMENT FOR AFFIRMATIVE ACTION TO ENSURE EQUAL
EMPLOYMENT OPPORTUNITY (EXECUTIVE ORDER 11246)**

1. The Bidder's attention is called to the "Equal Opportunity" and the "Specific Equal Employment Opportunity Responsibilities" set forth in the "Required Federal Aid Construction Contract Provisions."

2. The goals and timetables for minority and female participation, expressed in percentage terms for the Contractor's aggregate workforce in each trade on all construction work on this project are as follows:

CATEGORY	TIMETABLE	GOAL
Female participation in each trade	Indefinite	6.9%
Minority participation in each	None	69.1% (Oahu)
Trade (female included)	None	70.4% (Hawaii, Maui, Kauai)

These goals are applicable to all the Contractor's aggregate on-site construction workforce whether or not part of that workforce is performing work on a Federal or Federally assisted construction contract or subcontract.

The Contractor's compliance with the Executive Order shall be based on its implementation of the Equal Opportunity Clause, and its efforts to meet the goals established for the contract resulting from this solicitation. The hours of female and minority employment and training must be substantially uniform throughout the length of the contract, and in trade, and the Contractor shall make a good faith effort to employ minorities and women evenly on each of its projects. The transfer of minority or female employees or trainees from Contractor to Contractor or from project to project for the sole purpose of meeting the Contractor's goals shall be a violation of the contract and Executive Order. Compliance with the goals will be measured against the total work hours performed.

3. The Contractor shall provide written notification to the Area Director, Hawaii Area Office, Office of Federal Contract Compliance Programs, U.S. Department of Labor, 300 Ala Moana Blvd., P.O. Box 50149, Honolulu, Hawaii 96850, within 10 working days of award of any construction subcontract in excess of \$10,000 at any tier for construction work under the contract resulting from this solicitation. The notification shall list the name, address, and telephone number of the subcontractor; employer identification number; estimated dollar amount of the subcontract; and estimated starting and completion dates of the subcontract. The Contractor shall indicate which are minority group subcontractors and the ethnic identity and sex of the owner(s) and policy-making official(s).

CIVIL RIGHTS COMPLIANCE AND DISADVANTAGED BUSINESS ENTERPRISE SPECIAL PROVISIONS

I. GENERAL

This project is subject to Title 49 Code of Federal Regulations (CFR), Part 26, entitled "Participation by Disadvantaged Business Enterprise in Department of Transportation Financial Assistance Programs," hereinafter referred to as the "DBE Regulations" and is incorporated and made a part of this contract herein by this reference, as revised by the United States Department of Transportation's (USDOT) DBE Interim Final Rule (IFR) issued October 3, 2025 (hereinafter referred to as IFR). The following shall be incorporated as part of the contract documents for compliance. If any requirements herein conflict with the general provisions or special provisions applicable to this project, the requirements herein shall prevail unless specifically superseded or amended in the special provisions or by addendum.

II. POLICY

The Hawai'i Department of Transportation's (HDOT) Disadvantaged Business Enterprise (DBE) program will operate in a nondiscriminatory manner and without regard to race or sex, while maximizing efficiency of service.

Bidders/offerors, subcontractors, consultants, vendors, suppliers, distributors, manufacturers, trucking companies, service providers, etc. shall fully inform themselves with respect to the requirements of the DBE Regulations.

HDOT's DBE program remains in effect pursuant to 49 CFR Parts 23 and 26. However, consistent with the USDOT's IFR effective October 3, 2025, HDOT has suspended race-conscious measures including DBE contract goals, counting of DBE participation, and associated special provisions, pending the completion of HDOT's DBE certification reevaluation. Where indicated, HDOT reserves the right to reinstate or amend DBE special provisions at a later date, subject to approval by the appropriate USDOT operating administration.

HDOT reserves the right to reimplement, revise, or otherwise modify any reserved provisions, in whole or in part, following its reevaluation period or upon receipt of additional federal guidance. Upon such reimplementation, contractors will be notified in writing and shall comply with the updated requirements as directed by HDOT.

III. NON-DISCRIMINATION POLICY

Each contract signed with a prime contractor (and each subcontract the prime contractor signs with a subcontractor) shall include the following assurance:

"The contractor, sub-recipient, or subcontractor shall not discriminate on the basis of race, color, national origin, or sex in the performance of this contract. The contractor shall carry out applicable requirements of 49 CFR Part 26, as revised by the

DBE IFR, in the award and administration of USDOT assisted contracts. Failure by the contractor to carry out these requirements is a material breach of this contract, which may result in the termination of this contract or such other remedy as the recipient deems appropriate which may include, but is not limited to: 1) withholding monthly progress payments; 2) assessing sanctions; 3) liquidated damages; and/or 4) disqualifying the contractor from future bidding as non-responsible.”

The prime contractor agrees to include the above statements in any subsequent contracts that it enters into with other contractors and shall require those contractors to include similar statements in further agreements.

IV. BIDDER REGISTRATION

HDOT requests that all bidders/offers bidding projects submit the Bidder Registration Form to: HDOT-DBE@hawaii.gov. The Bidder Registration Form can be downloaded at:

<https://hidot.hawaii.gov/administration/files/2025/10/RBidRegistration-09.18.25-rev-DBE-IFR-10.15.25.pdf>.

Registered bidders/offers are posted on the website at:
<https://hidot.hawaii.gov/administration/ocr/dbe/>.

V. BIDDER/OFFEROR RESPONSIBILITIES (RESERVED)

VI. PROPOSAL REQUIREMENTS (RESERVED)

VII. COUNTING DBE PARTICIPATION TOWARDS CONTRACT GOAL (RESERVED)

VIII. USE OF JOINT CHECKS UNDER THE DBE PROGRAM (RESERVED)

IX. DEMONSTRATION OF GOOD FAITH EFFORTS FOR CONTRACT AWARD (RESERVED)

X. ADMINISTRATIVE RECONSIDERATION (RESERVED)

XI. AWARD OF CONTRACT (RESERVED)

XII. REPLACEMENT OF A DBE ON A PROJECT WITH A CONTRACT GOAL (RESERVED)

XIII. CONTRACT COMPLIANCE

This contract is subject to contract compliance tracking, and the prime contractor and all subcontractors are required to report payments electronically in the HDOT online Certification and Contract Compliance Management System (hereafter referred to as

“online tracking system”).) The prime contractor shall report the date payment was made by HDOT and shall report payment to all subcontractors for the audit period. The prime contractor and all subcontractors are responsible for responding by any noted response date or due date to any instructions or request for information, and to check the online tracking system on a regular basis to manage contact information and contract records.

The prime contractor is responsible for ensuring all subcontractors have completed all requested items and that their contact information is accurate and up-to-date. HDOT may require additional information related to the contract to be provided electronically through the online tracking system at any time before, during, or after contract award. Information related to contractor access of the online tracking system will be provided to designated point of contact with each contractor upon award of the contract. The online tracking system is web-based and can be accessed at the following internet address: <https://hdot.dbesystem.com/>.

XIV. PAYMENT

- A. HDOT will make an estimate in writing each month based on the items of work performed and materials incorporated in the work and the value therefore at the unit prices or lump sum prices set forth in the contract. All progress estimates and payments will be approximate only and shall be subject to correction at any time prior to or in the final estimate and payment. HDOT will not withhold any amount from any payment to the contractor, including retainage.
- B. The contractor shall pay all subcontractors within 10 calendar days after receipt of any progress payments from HDOT. This clause applies to all subcontractors, and all tiers of subcontracts. As per HRS § 103-10.5 Prompt payment, the contractor will verify that payment or retainage has been released to the subcontractors or its suppliers within the specified time through entries in HDOT’s online tracking system during the corresponding monthly audits. Prompt payment will be monitored and enforced through the contractor’s reporting of payments to its subcontractors and suppliers in the online tracking system.

Subcontractors, including lower tier subcontractors and/or suppliers will confirm the timeliness and the payment amounts received utilizing the online tracking system. Discrepancies will be investigated by the DBE Program Office and the project engineer. Payments to the subcontractors, including lower tier subcontractors, and including retainage released after the subcontractor or lower tier subcontractor’s work has been completed to HDOT’s satisfaction, will be reported by the Contractor or the subcontractor.

- C. When any subcontractor has satisfactorily completed its work as specified in the subcontract, and there are no bona fide disputes, the contractor shall make prompt and full payment to the subcontractor of all monies due, including retainage, within 10 calendar days after the subcontractor’s work is satisfactorily completed. A subcontractor’s work is satisfactorily completed when all the tasks called for in

the subcontract have been accomplished and documented, as required by HDOT. The contractor must obtain the prior written approval from HDOT before it can continue to withhold retainage from any subcontractor who has completed its portion of the work. This clause applies all subcontractors, and all tiers of subcontracts.

XV. RECORDS

The contractor shall maintain and keep all records necessary for HDOT to determine compliance with the contractor's compliance obligations. The records shall be available at reasonable times and places for inspection by HDOT and appropriate Federal agencies. The records to be kept by the contractor shall include:

1. The names, address, phone number, and contact person of consultants, subcontractors, manufacturers, suppliers, distributors, truckers and vendors;
2. The nature of work of each consultant, subcontractor, manufacturer, supplier, distributor, trucker and vendor;
3. The dollar amount contracted with each consultant, subcontractor, manufacturer, supplier, distributor, trucker and vendor; and
4. Cumulative dollar amount of all change orders to the subcontract.

XVI. FAILURE TO COMPLY WITH STATED REQUIREMENTS

The contractor shall carry out applicable requirements of 49 CFR Part 26 in the award and administration of USDOT assisted contracts. All contractors, subcontractors, manufacturers, suppliers, and distributors are hereby advised that failure to carry out all requirements specified herein shall constitute a material breach of contract that may result in termination of the contract or such other remedy as deemed appropriate by HDOT including but not limited to:

1) withholding monthly progress payments; 2) assessing sanctions; 3) liquidated damages; and/or 4) disqualifying the contractor from future bidding as non-responsible.

REQUIRED CONTRACT PROVISIONS FEDERAL-AID CONSTRUCTION CONTRACTS

- I. General
- II. Nondiscrimination
- III. Non-segregated Facilities
- IV. Davis-Bacon and Related Act Provisions
- V. Contract Work Hours and Safety Standards Act Provisions
- VI. Subletting or Assigning the Contract
- VII. Safety: Accident Prevention
- VIII. False Statements Concerning Highway Projects
- IX. Implementation of Clean Air Act and Federal Water Pollution Control Act
- X. Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion
- XI. Certification Regarding Use of Contract Funds for Lobbying
- XII. Use of United States-Flag Vessels:

ATTACHMENTS

A. Employment and Materials Preference for Appalachian Development Highway System or Appalachian Local Access Road Contracts (included in Appalachian contracts only)

I. GENERAL

1. Form FHWA-1273 must be physically incorporated in each construction contract funded under title 23, United States Code, as required in 23 CFR 633.102(b) (excluding emergency contracts solely intended for debris removal). The contractor (or subcontractor) must insert this form in each subcontract and further require its inclusion in all lower tier subcontracts (excluding purchase orders, rental agreements and other agreements for supplies or services). 23 CFR 633.102(e).

The applicable requirements of Form FHWA-1273 are incorporated by reference for work done under any purchase order, rental agreement or agreement for other services. The prime contractor shall be responsible for compliance by any subcontractor, lower-tier subcontractor or service provider. 23 CFR 633.102(e).

Form FHWA-1273 must be included in all Federal-aid design-build contracts, in all subcontracts and in lower tier subcontracts (excluding subcontracts for design services, purchase orders, rental agreements and other agreements for supplies or services) in accordance with 23 CFR 633.102. The design-builder shall be responsible for compliance by any subcontractor, lower-tier subcontractor or service provider.

Contracting agencies may reference Form FHWA-1273 in solicitation-for-bids or request-for-proposals documents, however, the Form FHWA-1273 must be physically incorporated (not referenced) in all contracts, subcontracts and lower-tier subcontracts (excluding purchase orders, rental agreements and other agreements for supplies or services related to a construction contract). 23 CFR 633.102(b).

2. Subject to the applicability criteria noted in the following sections, these contract provisions shall apply to all work

performed on the contract by the contractor's own organization and with the assistance of workers under the contractor's immediate superintendence and to all work performed on the contract by piecework, station work, or by subcontract. 23 CFR 633.102(d).

3. A breach of any of the stipulations contained in these Required Contract Provisions may be sufficient grounds for withholding of progress payments, withholding of final payment, termination of the contract, suspension / debarment or any other action determined to be appropriate by the contracting agency and FHWA.

4. Selection of Labor: During the performance of this contract, the contractor shall not use convict labor for any purpose within the limits of a construction project on a Federal-aid highway unless it is labor performed by convicts who are on parole, supervised release, or probation. 23 U.S.C. 114(b). The term Federal-aid highway does not include roadways functionally classified as local roads or rural minor collectors. 23 U.S.C. 101(a).

II. NONDISCRIMINATION (23 CFR 230.107(a); 23 CFR Part 230, Subpart A, Appendix A; EO 11246)

The provisions of this section related to 23 CFR Part 230, Subpart A, Appendix A are applicable to all Federal-aid construction contracts and to all related construction subcontracts of \$10,000 or more. The provisions of 23 CFR Part 230 are not applicable to material supply, engineering, or architectural service contracts.

In addition, the contractor and all subcontractors must comply with the following policies: Executive Order 11246, 41 CFR Part 60, 29 CFR Parts 1625-1627, 23 U.S.C. 140, Section 504 of the Rehabilitation Act of 1973, as amended (29 U.S.C. 794), Title VI of the Civil Rights Act of 1964, as amended (42 U.S.C. 2000d et seq.), and related regulations including 49 CFR Parts 21, 26, and 27; and 23 CFR Parts 200, 230, and 633.

The contractor and all subcontractors must comply with: the requirements of the Equal Opportunity Clause in 41 CFR 60-1.4(b) and, for all construction contracts exceeding \$10,000, the Standard Federal Equal Employment Opportunity Construction Contract Specifications in 41 CFR 60-4.3.

Note: The U.S. Department of Labor has exclusive authority to determine compliance with Executive Order 11246 and the policies of the Secretary of Labor including 41 CFR Part 60, and 29 CFR Parts 1625-1627. The contracting agency and the FHWA have the authority and the responsibility to ensure compliance with 23 U.S.C. 140, Section 504 of the Rehabilitation Act of 1973, as amended (29 U.S.C. 794), and Title VI of the Civil Rights Act of 1964, as amended (42 U.S.C. 2000d et seq.), and related regulations including 49 CFR Parts 21, 26, and 27; and 23 CFR Parts 200, 230, and 633.

The following provision is adopted from 23 CFR Part 230, Subpart A, Appendix A, with appropriate revisions to conform to the U.S. Department of Labor (US DOL) and FHWA requirements.

1. Equal Employment Opportunity: Equal Employment Opportunity (EEO) requirements not to discriminate and to take affirmative action to assure equal opportunity as set forth under laws, executive orders, rules, regulations (see 28 CFR Part 35, 29 CFR Part 1630, 29 CFR Parts 1625-1627, 41 CFR Part 60 and 49 CFR Part 27) and orders of the Secretary of Labor as modified by the provisions prescribed herein, and imposed pursuant to 23 U.S.C. 140, shall constitute the EEO and specific affirmative action standards for the contractor's project activities under this contract. The provisions of the Americans with Disabilities Act of 1990 (42 U.S.C. 12101 et seq.) set forth under 28 CFR Part 35 and 29 CFR Part 1630 are incorporated by reference in this contract. In the execution of this contract, the contractor agrees to comply with the following minimum specific requirement activities of EEO:

a. The contractor will work with the contracting agency and the Federal Government to ensure that it has made every good faith effort to provide equal opportunity with respect to all of its terms and conditions of employment and in their review of activities under the contract. 23 CFR 230.409 (g)(4) & (5).

b. The contractor will accept as its operating policy the following statement:

"It is the policy of this Company to assure that applicants are employed, and that employees are treated during employment, without regard to their race, religion, sex, sexual orientation, gender identity, color, national origin, age or disability. Such action shall include: employment, upgrading, demotion, or transfer; recruitment or recruitment advertising; layoff or termination; rates of pay or other forms of compensation; and selection for training, including apprenticeship, pre-apprenticeship, and/or on-the-job training."

2. EEO Officer: The contractor will designate and make known to the contracting officers an EEO Officer who will have the responsibility for and must be capable of effectively administering and promoting an active EEO program and who must be assigned adequate authority and responsibility to do so.

3. Dissemination of Policy: All members of the contractor's staff who are authorized to hire, supervise, promote, and discharge employees, or who recommend such action or are substantially involved in such action, will be made fully cognizant of and will implement the contractor's EEO policy and contractual responsibilities to provide EEO in each grade and classification of employment. To ensure that the above agreement will be met, the following actions will be taken as a minimum:

a. Periodic meetings of supervisory and personnel office employees will be conducted before the start of work and then not less often than once every six months, at which time the contractor's EEO policy and its implementation will be reviewed and explained. The meetings will be conducted by the EEO Officer or other knowledgeable company official.

b. All new supervisory or personnel office employees will be given a thorough indoctrination by the EEO Officer, covering all major aspects of the contractor's EEO obligations within thirty days following their reporting for duty with the contractor.

c. All personnel who are engaged in direct recruitment for the project will be instructed by the EEO Officer in the contractor's procedures for locating and hiring minorities and women.

d. Notices and posters setting forth the contractor's EEO policy will be placed in areas readily accessible to employees, applicants for employment and potential employees.

e. The contractor's EEO policy and the procedures to implement such policy will be brought to the attention of employees by means of meetings, employee handbooks, or other appropriate means.

4. Recruitment: When advertising for employees, the contractor will include in all advertisements for employees the notation: "An Equal Opportunity Employer." All such advertisements will be placed in publications having a large circulation among minorities and women in the area from which the project work force would normally be derived.

a. The contractor will, unless precluded by a valid bargaining agreement, conduct systematic and direct recruitment through public and private employee referral sources likely to yield qualified minorities and women. To meet this requirement, the contractor will identify sources of potential minority group employees and establish with such identified sources procedures whereby minority and women applicants may be referred to the contractor for employment consideration.

b. In the event the contractor has a valid bargaining agreement providing for exclusive hiring hall referrals, the contractor is expected to observe the provisions of that agreement to the extent that the system meets the contractor's compliance with EEO contract provisions. Where implementation of such an agreement has the effect of discriminating against minorities or women, or obligates the contractor to do the same, such implementation violates Federal nondiscrimination provisions.

c. The contractor will encourage its present employees to refer minorities and women as applicants for employment. Information and procedures with regard to referring such applicants will be discussed with employees.

5. Personnel Actions: Wages, working conditions, and employee benefits shall be established and administered, and personnel actions of every type, including hiring, upgrading, promotion, transfer, demotion, layoff, and termination, shall be taken without regard to race, color, religion, sex, sexual orientation, gender identity, national origin, age or disability. The following procedures shall be followed:

a. The contractor will conduct periodic inspections of project sites to ensure that working conditions and employee facilities do not indicate discriminatory treatment of project site personnel.

b. The contractor will periodically evaluate the spread of wages paid within each classification to determine any evidence of discriminatory wage practices.

c. The contractor will periodically review selected personnel actions in depth to determine whether there is evidence of discrimination. Where evidence is found, the contractor will promptly take corrective action. If the review indicates that the discrimination may extend beyond the actions reviewed, such corrective action shall include all affected persons.

d. The contractor will promptly investigate all complaints of alleged discrimination made to the contractor in connection with its obligations under this contract, will attempt to resolve such complaints, and will take appropriate corrective action

within a reasonable time. If the investigation indicates that the discrimination may affect persons other than the complainant, such corrective action shall include such other persons. Upon completion of each investigation, the contractor will inform every complainant of all of their avenues of appeal.

6. Training and Promotion:

a. The contractor will assist in locating, qualifying, and increasing the skills of minorities and women who are applicants for employment or current employees. Such efforts should be aimed at developing full journey level status employees in the type of trade or job classification involved.

b. Consistent with the contractor's work force requirements and as permissible under Federal and State regulations, the contractor shall make full use of training programs (i.e., apprenticeship and on-the-job training programs for the geographical area of contract performance). In the event a special provision for training is provided under this contract, this subparagraph will be superseded as indicated in the special provision. The contracting agency may reserve training positions for persons who receive welfare assistance in accordance with 23 U.S.C. 140(a).

c. The contractor will advise employees and applicants for employment of available training programs and entrance requirements for each.

d. The contractor will periodically review the training and promotion potential of employees who are minorities and women and will encourage eligible employees to apply for such training and promotion.

7. Unions: If the contractor relies in whole or in part upon unions as a source of employees, the contractor will use good faith efforts to obtain the cooperation of such unions to increase opportunities for minorities and women. 23 CFR 230.409. Actions by the contractor, either directly or through a contractor's association acting as agent, will include the procedures set forth below:

a. The contractor will use good faith efforts to develop, in cooperation with the unions, joint training programs aimed toward qualifying more minorities and women for membership in the unions and increasing the skills of minorities and women so that they may qualify for higher paying employment.

b. The contractor will use good faith efforts to incorporate an EEO clause into each union agreement to the end that such union will be contractually bound to refer applicants without regard to their race, color, religion, sex, sexual orientation, gender identity, national origin, age, or disability.

c. The contractor is to obtain information as to the referral practices and policies of the labor union except that to the extent such information is within the exclusive possession of the labor union and such labor union refuses to furnish such information to the contractor, the contractor shall so certify to the contracting agency and shall set forth what efforts have been made to obtain such information.

d. In the event the union is unable to provide the contractor with a reasonable flow of referrals within the time limit set forth in the collective bargaining agreement, the contractor will, through independent recruitment efforts, fill the employment vacancies without regard to race, color, religion, sex, sexual orientation, gender identity, national origin, age, or disability; making full efforts to obtain qualified and/or qualifiable minorities and women. The failure of a union to provide

sufficient referrals (even though it is obligated to provide exclusive referrals under the terms of a collective bargaining agreement) does not relieve the contractor from the requirements of this paragraph. In the event the union referral practice prevents the contractor from meeting the obligations pursuant to Executive Order 11246, as amended, and these special provisions, such contractor shall immediately notify the contracting agency.

8. Reasonable Accommodation for Applicants /

Employees with Disabilities: The contractor must be familiar with the requirements for and comply with the Americans with Disabilities Act and all rules and regulations established thereunder. Employers must provide reasonable accommodation in all employment activities unless to do so would cause an undue hardship.

9. Selection of Subcontractors, Procurement of Materials

and Leasing of Equipment: The contractor shall not discriminate on the grounds of race, color, religion, sex, sexual orientation, gender identity, national origin, age, or disability in the selection and retention of subcontractors, including procurement of materials and leases of equipment. The contractor shall take all necessary and reasonable steps to ensure nondiscrimination in the administration of this contract.

a. The contractor shall notify all potential subcontractors, suppliers, and lessors of their EEO obligations under this contract.

b. The contractor will use good faith efforts to ensure subcontractor compliance with their EEO obligations.

10. Assurances Required:

a. The requirements of 49 CFR Part 26 and the State DOT's FHWA-approved Disadvantaged Business Enterprise (DBE) program are incorporated by reference.

b. The contractor, subrecipient or subcontractor shall not discriminate on the basis of race, color, national origin, or sex in the performance of this contract. The contractor shall carry out applicable requirements of 49 CFR part 26 in the award and administration of DOT-assisted contracts. Failure by the contractor to carry out these requirements is a material breach of this contract, which may result in the termination of this contract or such other remedy as the recipient deems appropriate, which may include, but is not limited to:

- (1) Withholding monthly progress payments;
- (2) Assessing sanctions;
- (3) Liquidated damages; and/or
- (4) Disqualifying the contractor from future bidding as non-responsible.

c. The Title VI and nondiscrimination provisions of U.S. DOT Order 1050.2A at Appendixes A and E are incorporated by reference. 49 CFR Part 21.

11. Records and Reports: The contractor shall keep such records as necessary to document compliance with the EEO requirements. Such records shall be retained for a period of three years following the date of the final payment to the contractor for all contract work and shall be available at reasonable times and places for inspection by authorized representatives of the contracting agency and the FHWA.

a. The records kept by the contractor shall document the following:

(1) The number and work hours of minority and non-minority group members and women employed in each work classification on the project;

(2) The progress and efforts being made in cooperation with unions, when applicable, to increase employment opportunities for minorities and women; and

(3) The progress and efforts being made in locating, hiring, training, qualifying, and upgrading minorities and women.

b. The contractors and subcontractors will submit an annual report to the contracting agency each July for the duration of the project indicating the number of minority, women, and non-minority group employees currently engaged in each work classification required by the contract work. This information is to be reported on [Form FHWA-1391](#). The staffing data should represent the project work force on board in all or any part of the last payroll period preceding the end of July. If on-the-job training is being required by special provision, the contractor will be required to collect and report training data. The employment data should reflect the work force on board during all or any part of the last payroll period preceding the end of July.

III. NONSEGREGATED FACILITIES

This provision is applicable to all Federal-aid construction contracts and to all related construction subcontracts of more than \$10,000. 41 CFR 60-1.5.

As prescribed by 41 CFR 60-1.8, the contractor must ensure that facilities provided for employees are provided in such a manner that segregation on the basis of race, color, religion, sex, sexual orientation, gender identity, or national origin cannot result. The contractor may neither require such segregated use by written or oral policies nor tolerate such use by employee custom. The contractor's obligation extends further to ensure that its employees are not assigned to perform their services at any location under the contractor's control where the facilities are segregated. The term "facilities" includes waiting rooms, work areas, restaurants and other eating areas, time clocks, restrooms, washrooms, locker rooms and other storage or dressing areas, parking lots, drinking fountains, recreation or entertainment areas, transportation, and housing provided for employees. The contractor shall provide separate or single-user restrooms and necessary dressing or sleeping areas to assure privacy between sexes.

IV. DAVIS-BACON AND RELATED ACT PROVISIONS

This section is applicable to all Federal-aid construction projects exceeding \$2,000 and to all related subcontracts and lower-tier subcontracts (regardless of subcontract size), in accordance with 29 CFR 5.5. The requirements apply to all projects located within the right-of-way of a roadway that is functionally classified as Federal-aid highway. 23 U.S.C. 113. This excludes roadways functionally classified as local roads or rural minor collectors, which are exempt. 23 U.S.C. 101. Where applicable law requires that projects be treated as a project on a Federal-aid highway, the provisions of this subpart will apply regardless of the location of the project. Examples include: Surface Transportation Block Grant Program projects funded under 23 U.S.C. 133 [excluding recreational trails projects], the Nationally Significant Freight and Highway

Projects funded under 23 U.S.C. 117, and National Highway Freight Program projects funded under 23 U.S.C. 167.

The following provisions are from the U.S. Department of Labor regulations in 29 CFR 5.5 "Contract provisions and related matters" with minor revisions to conform to the FHWA-1273 format and FHWA program requirements.

1. Minimum wages (29 CFR 5.5)

a. *Wage rates and fringe benefits.* All laborers and mechanics employed or working upon the site of the work (or otherwise working in construction or development of the project under a development statute), will be paid unconditionally and not less often than once a week, and without subsequent deduction or rebate on any account (except such payroll deductions as are permitted by regulations issued by the Secretary of Labor under the Copeland Act ([29 CFR part 3](#))), the full amount of basic hourly wages and bona fide fringe benefits (or cash equivalents thereof) due at time of payment computed at rates not less than those contained in the wage determination of the Secretary of Labor which is attached hereto and made a part hereof, regardless of any contractual relationship which may be alleged to exist between the contractor and such laborers and mechanics. As provided in paragraphs (d) and (e) of 29 CFR 5.5, the appropriate wage determinations are effective by operation of law even if they have not been attached to the contract. Contributions made or costs reasonably anticipated for bona fide fringe benefits under the Davis-Bacon Act ([40 U.S.C. 3141\(2\)\(B\)](#)) on behalf of laborers or mechanics are considered wages paid to such laborers or mechanics, subject to the provisions of paragraph 1.e. of this section; also, regular contributions made or costs incurred for more than a weekly period (but not less often than quarterly) under plans, funds, or programs which cover the particular weekly period, are deemed to be constructively made or incurred during such weekly period. Such laborers and mechanics must be paid the appropriate wage rate and fringe benefits on the wage determination for the classification(s) of work actually performed, without regard to skill, except as provided in paragraph 4. of this section. Laborers or mechanics performing work in more than one classification may be compensated at the rate specified for each classification for the time actually worked therein: *Provided*, That the employer's payroll records accurately set forth the time spent in each classification in which work is performed. The wage determination (including any additional classifications and wage rates conformed under paragraph 1.c. of this section) and the Davis-Bacon poster (WH-1321) must be posted at all times by the contractor and its subcontractors at the site of the work in a prominent and accessible place where it can be easily seen by the workers.

b. *Frequently recurring classifications.* (1) In addition to wage and fringe benefit rates that have been determined to be prevailing under the procedures set forth in [29 CFR part 1](#), a wage determination may contain, pursuant to § 1.3(f), wage and fringe benefit rates for classifications of laborers and mechanics for which conformance requests are regularly submitted pursuant to paragraph 1.c. of this section, provided that:

(i) The work performed by the classification is not performed by a classification in the wage determination for which a prevailing wage rate has been determined;

(ii) The classification is used in the area by the construction industry; and

(iii) The wage rate for the classification bears a reasonable relationship to the prevailing wage rates contained in the wage determination.

(2) The Administrator will establish wage rates for such classifications in accordance with paragraph 1.c.(1)(iii) of this section. Work performed in such a classification must be paid at no less than the wage and fringe benefit rate listed on the wage determination for such classification.

c. *Conformance.* (1) The contracting officer must require that any class of laborers or mechanics, including helpers, which is not listed in the wage determination and which is to be employed under the contract be classified in conformance with the wage determination. Conformance of an additional classification and wage rate and fringe benefits is appropriate only when the following criteria have been met:

(i) The work to be performed by the classification requested is not performed by a classification in the wage determination; and

(ii) The classification is used in the area by the construction industry; and

(iii) The proposed wage rate, including any bona fide fringe benefits, bears a reasonable relationship to the wage rates contained in the wage determination.

(2) The conformance process may not be used to split, subdivide, or otherwise avoid application of classifications listed in the wage determination.

(3) If the contractor and the laborers and mechanics to be employed in the classification (if known), or their representatives, and the contracting officer agree on the classification and wage rate (including the amount designated for fringe benefits where appropriate), a report of the action taken will be sent by the contracting officer by email to DBAconformance@dol.gov. The Administrator, or an authorized representative, will approve, modify, or disapprove every additional classification action within 30 days of receipt and so advise the contracting officer or will notify the contracting officer within the 30-day period that additional time is necessary.

(4) In the event the contractor, the laborers or mechanics to be employed in the classification or their representatives, and the contracting officer do not agree on the proposed classification and wage rate (including the amount designated for fringe benefits, where appropriate), the contracting officer will, by email to DBAconformance@dol.gov, refer the questions, including the views of all interested parties and the recommendation of the contracting officer, to the Administrator for determination. The Administrator, or an authorized representative, will issue a determination within 30 days of receipt and so advise the contracting officer or will notify the contracting officer within the 30-day period that additional time is necessary.

(5) The contracting officer must promptly notify the contractor of the action taken by the Wage and Hour Division

under paragraphs 1.c.(3) and (4) of this section. The contractor must furnish a written copy of such determination to each affected worker or it must be posted as a part of the wage determination. The wage rate (including fringe benefits where appropriate) determined pursuant to paragraph 1.c.(3) or (4) of this section must be paid to all workers performing work in the classification under this contract from the first day on which work is performed in the classification.

d. *Fringe benefits not expressed as an hourly rate.* Whenever the minimum wage rate prescribed in the contract for a class of laborers or mechanics includes a fringe benefit which is not expressed as an hourly rate, the contractor may either pay the benefit as stated in the wage determination or may pay another bona fide fringe benefit or an hourly cash equivalent thereof.

e. *Unfunded plans.* If the contractor does not make payments to a trustee or other third person, the contractor may consider as part of the wages of any laborer or mechanic the amount of any costs reasonably anticipated in providing bona fide fringe benefits under a plan or program, *Provided*, That the Secretary of Labor has found, upon the written request of the contractor, in accordance with the criteria set forth in § 5.28, that the applicable standards of the Davis-Bacon Act have been met. The Secretary of Labor may require the contractor to set aside in a separate account assets for the meeting of obligations under the plan or program.

f. *Interest.* In the event of a failure to pay all or part of the wages required by the contract, the contractor will be required to pay interest on any underpayment of wages.

2. Withholding (29 CFR 5.5)

a. *Withholding requirements.* The contracting agency may, upon its own action, or must, upon written request of an authorized representative of the Department of Labor, withhold or cause to be withheld from the contractor so much of the accrued payments or advances as may be considered necessary to satisfy the liabilities of the prime contractor or any subcontractor for the full amount of wages and monetary relief, including interest, required by the clauses set forth in this section for violations of this contract, or to satisfy any such liabilities required by any other Federal contract, or federally assisted contract subject to Davis-Bacon labor standards, that is held by the same prime contractor (as defined in § 5.2). The necessary funds may be withheld from the contractor under this contract, any other Federal contract with the same prime contractor, or any other federally assisted contract that is subject to Davis-Bacon labor standards requirements and is held by the same prime contractor, regardless of whether the other contract was awarded or assisted by the same agency, and such funds may be used to satisfy the contractor liability for which the funds were withheld. In the event of a contractor's failure to pay any laborer or mechanic, including any apprentice or helper working on the site of the work all or part of the wages required by the contract, or upon the contractor's failure to submit the required records as discussed in paragraph 3.d. of this section, the contracting agency may on its own initiative and after written notice to the contractor, take such action as may be necessary to cause the suspension of any further payment, advance, or guarantee of funds until such violations have ceased.

b. *Priority to withheld funds.* The Department has priority to funds withheld or to be withheld in accordance with paragraph

2.a. of this section or Section V, paragraph 3.a., or both, over claims to those funds by:

- (1) A contractor's surety(ies), including without limitation performance bond sureties and payment bond sureties;
- (2) A contracting agency for its procurement costs;
- (3) A trustee(s) (either a court-appointed trustee or a U.S. trustee, or both) in bankruptcy of a contractor, or a contractor's bankruptcy estate;
- (4) A contractor's assignee(s);
- (5) A contractor's successor(s); or
- (6) A claim asserted under the Prompt Payment Act, [31 U.S.C. 3901](#)–3907.

3. Records and certified payrolls (29 CFR 5.5)

a. *Basic record requirements* (1) *Length of record retention.* All regular payrolls and other basic records must be maintained by the contractor and any subcontractor during the course of the work and preserved for all laborers and mechanics working at the site of the work (or otherwise working in construction or development of the project under a development statute) for a period of at least 3 years after all the work on the prime contract is completed.

(2) *Information required.* Such records must contain the name; Social Security number; last known address, telephone number, and email address of each such worker; each worker's correct classification(s) of work actually performed; hourly rates of wages paid (including rates of contributions or costs anticipated for bona fide fringe benefits or cash equivalents thereof of the types described in [40 U.S.C. 3141\(2\)\(B\)](#) of the Davis-Bacon Act); daily and weekly number of hours actually worked in total and on each covered contract; deductions made; and actual wages paid.

(3) *Additional records relating to fringe benefits.* Whenever the Secretary of Labor has found under paragraph 1.e. of this section that the wages of any laborer or mechanic include the amount of any costs reasonably anticipated in providing benefits under a plan or program described in [40 U.S.C. 3141\(2\)\(B\)](#) of the Davis-Bacon Act, the contractor must maintain records which show that the commitment to provide such benefits is enforceable, that the plan or program is financially responsible, and that the plan or program has been communicated in writing to the laborers or mechanics affected, and records which show the costs anticipated or the actual cost incurred in providing such benefits.

(4) *Additional records relating to apprenticeship.* Contractors with apprentices working under approved programs must maintain written evidence of the registration of apprenticeship programs, the registration of the apprentices, and the ratios and wage rates prescribed in the applicable programs.

b. *Certified payroll requirements* (1) *Frequency and method of submission.* The contractor or subcontractor must submit weekly, for each week in which any DBA- or Related Acts-covered work is performed, certified payrolls to the contracting

agency. The prime contractor is responsible for the submission of all certified payrolls by all subcontractors. A contracting agency or prime contractor may permit or require contractors to submit certified payrolls through an electronic system, as long as the electronic system requires a legally valid electronic signature; the system allows the contractor, the contracting agency, and the Department of Labor to access the certified payrolls upon request for at least 3 years after the work on the prime contract has been completed; and the contracting agency or prime contractor permits other methods of submission in situations where the contractor is unable or limited in its ability to use or access the electronic system.

(2) *Information required.* The certified payrolls submitted must set out accurately and completely all of the information required to be maintained under paragraph 3.a.(2) of this section, except that full Social Security numbers and last known addresses, telephone numbers, and email addresses must not be included on weekly transmittals. Instead, the certified payrolls need only include an individually identifying number for each worker (e.g., the last four digits of the worker's Social Security number). The required weekly certified payroll information may be submitted using Optional Form WH-347 or in any other format desired. Optional Form WH-347 is available for this purpose from the Wage and Hour Division website at <https://www.dol.gov/sites/dolgov/files/WHDL/legacy/files/wh347.pdf> or its successor website. It is not a violation of this section for a prime contractor to require a subcontractor to provide full Social Security numbers and last known addresses, telephone numbers, and email addresses to the prime contractor for its own records, without weekly submission by the subcontractor to the contracting agency.

(3) *Statement of Compliance.* Each certified payroll submitted must be accompanied by a "Statement of Compliance," signed by the contractor or subcontractor, or the contractor's or subcontractor's agent who pays or supervises the payment of the persons working on the contract, and must certify the following:

(i) That the certified payroll for the payroll period contains the information required to be provided under paragraph 3.b. of this section, the appropriate information and basic records are being maintained under paragraph 3.a. of this section, and such information and records are correct and complete;

(ii) That each laborer or mechanic (including each helper and apprentice) working on the contract during the payroll period has been paid the full weekly wages earned, without rebate, either directly or indirectly, and that no deductions have been made either directly or indirectly from the full wages earned, other than permissible deductions as set forth in [29 CFR part 3](#); and

(iii) That each laborer or mechanic has been paid not less than the applicable wage rates and fringe benefits or cash equivalents for the classification(s) of work actually performed, as specified in the applicable wage determination incorporated into the contract.

(4) *Use of Optional Form WH-347.* The weekly submission of a properly executed certification set forth on the reverse side of Optional Form WH-347 will satisfy the requirement for submission of the "Statement of Compliance" required by paragraph 3.b.(3) of this section.

(5) *Signature.* The signature by the contractor, subcontractor, or the contractor's or subcontractor's agent must be an original handwritten signature or a legally valid electronic signature.

(6) *Falsification.* The falsification of any of the above certifications may subject the contractor or subcontractor to civil or criminal prosecution under [18 U.S.C. 1001](#) and [31 U.S.C. 3729](#).

(7) *Length of certified payroll retention.* The contractor or subcontractor must preserve all certified payrolls during the course of the work and for a period of 3 years after all the work on the prime contract is completed.

c. *Contracts, subcontracts, and related documents.* The contractor or subcontractor must maintain this contract or subcontract and related documents including, without limitation, bids, proposals, amendments, modifications, and extensions. The contractor or subcontractor must preserve these contracts, subcontracts, and related documents during the course of the work and for a period of 3 years after all the work on the prime contract is completed.

d. *Required disclosures and access* (1) *Required record disclosures and access to workers.* The contractor or subcontractor must make the records required under paragraphs 3.a. through 3.c. of this section, and any other documents that the contracting agency, the State DOT, the FHWA, or the Department of Labor deems necessary to determine compliance with the labor standards provisions of any of the applicable statutes referenced by § 5.1, available for inspection, copying, or transcription by authorized representatives of the contracting agency, the State DOT, the FHWA, or the Department of Labor, and must permit such representatives to interview workers during working hours on the job.

(2) *Sanctions for non-compliance with records and worker access requirements.* If the contractor or subcontractor fails to submit the required records or to make them available, or refuses to permit worker interviews during working hours on the job, the Federal agency may, after written notice to the contractor, sponsor, applicant, owner, or other entity, as the case may be, that maintains such records or that employs such workers, take such action as may be necessary to cause the suspension of any further payment, advance, or guarantee of funds. Furthermore, failure to submit the required records upon request or to make such records available, or to permit worker interviews during working hours on the job, may be grounds for debarment action pursuant to § 5.12. In addition, any contractor or other person that fails to submit the required records or make those records available to WHD within the time WHD requests that the records be produced will be precluded from introducing as evidence in an administrative proceeding under [29 CFR part 6](#) any of the required records that were not provided or made available to WHD. WHD will take into consideration a reasonable request from the contractor or person for an extension of the time for submission of records. WHD will determine the reasonableness of the request and may consider, among other things, the location of the records and the volume of production.

(3) *Required information disclosures.* Contractors and subcontractors must maintain the full Social Security number and last known address, telephone number, and email address

of each covered worker, and must provide them upon request to the contracting agency, the State DOT, the FHWA, the contractor, or the Wage and Hour Division of the Department of Labor for purposes of an investigation or other compliance action.

4. Apprentices and equal employment opportunity (29 CFR 5.5)

a. *Apprentices (1) Rate of pay.* Apprentices will be permitted to work at less than the predetermined rate for the work they perform when they are employed pursuant to and individually registered in a bona fide apprenticeship program registered with the U.S. Department of Labor, Employment and Training Administration, Office of Apprenticeship (OA), or with a State Apprenticeship Agency recognized by the OA. A person who is not individually registered in the program, but who has been certified by the OA or a State Apprenticeship Agency (where appropriate) to be eligible for probationary employment as an apprentice, will be permitted to work at less than the predetermined rate for the work they perform in the first 90 days of probationary employment as an apprentice in such a program. In the event the OA or a State Apprenticeship Agency recognized by the OA withdraws approval of an apprenticeship program, the contractor will no longer be permitted to use apprentices at less than the applicable predetermined rate for the work performed until an acceptable program is approved.

(2) *Fringe benefits.* Apprentices must be paid fringe benefits in accordance with the provisions of the apprenticeship program. If the apprenticeship program does not specify fringe benefits, apprentices must be paid the full amount of fringe benefits listed on the wage determination for the applicable classification. If the Administrator determines that a different practice prevails for the applicable apprentice classification, fringe benefits must be paid in accordance with that determination.

(3) *Apprenticeship ratio.* The allowable ratio of apprentices to journeyworkers on the job site in any craft classification must not be greater than the ratio permitted to the contractor as to the entire work force under the registered program or the ratio applicable to the locality of the project pursuant to paragraph 4.a.(4) of this section. Any worker listed on a payroll at an apprentice wage rate, who is not registered or otherwise employed as stated in paragraph 4.a.(1) of this section, must be paid not less than the applicable wage rate on the wage determination for the classification of work actually performed. In addition, any apprentice performing work on the job site in excess of the ratio permitted under this section must be paid not less than the applicable wage rate on the wage determination for the work actually performed.

(4) *Reciprocity of ratios and wage rates.* Where a contractor is performing construction on a project in a locality other than the locality in which its program is registered, the ratios and wage rates (expressed in percentages of the journeyworker's hourly rate) applicable within the locality in which the construction is being performed must be observed. If there is no applicable ratio or wage rate for the locality of the project, the ratio and wage rate specified in the contractor's registered program must be observed.

b. *Equal employment opportunity.* The use of apprentices and journeyworkers under this part must be in conformity with

the equal employment opportunity requirements of Executive Order 11246, as amended, and [29 CFR part 30](#).

c. Apprentices and Trainees (programs of the U.S. DOT).

Apprentices and trainees working under apprenticeship and skill training programs which have been certified by the Secretary of Transportation as promoting EEO in connection with Federal-aid highway construction programs are not subject to the requirements of paragraph 4 of this Section IV. 23 CFR 230.111(e)(2). The straight time hourly wage rates for apprentices and trainees under such programs will be established by the particular programs. The ratio of apprentices and trainees to journeyworkers shall not be greater than permitted by the terms of the particular program.

5. Compliance with Copeland Act requirements. The contractor shall comply with the requirements of 29 CFR part 3, which are incorporated by reference in this contract as provided in 29 CFR 5.5.

6. Subcontracts. The contractor or subcontractor must insert FHWA-1273 in any subcontracts, along with the applicable wage determination(s) and such other clauses or contract modifications as the contracting agency may by appropriate instructions require, and a clause requiring the subcontractors to include these clauses and wage determination(s) in any lower tier subcontracts. The prime contractor is responsible for the compliance by any subcontractor or lower tier subcontractor with all the contract clauses in this section. In the event of any violations of these clauses, the prime contractor and any subcontractor(s) responsible will be liable for any unpaid wages and monetary relief, including interest from the date of the underpayment or loss, due to any workers of lower-tier subcontractors, and may be subject to debarment, as appropriate. 29 CFR 5.5.

7. Contract termination: debarment. A breach of the contract clauses in 29 CFR 5.5 may be grounds for termination of the contract, and for debarment as a contractor and a subcontractor as provided in 29 CFR 5.12.

8. Compliance with Davis-Bacon and Related Act requirements. All rulings and interpretations of the Davis-Bacon and Related Acts contained in 29 CFR parts 1, 3, and 5 are herein incorporated by reference in this contract as provided in 29 CFR 5.5.

9. Disputes concerning labor standards. As provided in 29 CFR 5.5, disputes arising out of the labor standards provisions of this contract shall not be subject to the general disputes clause of this contract. Such disputes shall be resolved in accordance with the procedures of the Department of Labor set forth in 29 CFR parts 5, 6, and 7. Disputes within the meaning of this clause include disputes between the contractor (or any of its subcontractors) and the contracting agency, the U.S. Department of Labor, or the employees or their representatives.

10. Certification of eligibility. a. By entering into this contract, the contractor certifies that neither it nor any person or firm who has an interest in the contractor's firm is a person or firm ineligible to be awarded Government contracts by virtue of [40 U.S.C. 3144\(b\)](#) or § 5.12(a).

b. No part of this contract shall be subcontracted to any person or firm ineligible for award of a Government contract by virtue of [40 U.S.C. 3144\(b\)](#) or § 5.12(a).

c. The penalty for making false statements is prescribed in the U.S. Code, Title 18 Crimes and Criminal Procedure, [18 U.S.C. 1001](#).

11. Anti-retaliation. It is unlawful for any person to discharge, demote, intimidate, threaten, restrain, coerce, blacklist, harass, or in any other manner discriminate against, or to cause any person to discharge, demote, intimidate, threaten, restrain, coerce, blacklist, harass, or in any other manner discriminate against, any worker or job applicant for:

a. Notifying any contractor of any conduct which the worker reasonably believes constitutes a violation of the DBA, Related Acts, this part, or [29 CFR part 1](#) or [3](#);

b. Filing any complaint, initiating or causing to be initiated any proceeding, or otherwise asserting or seeking to assert on behalf of themselves or others any right or protection under the DBA, Related Acts, this part, or [29 CFR part 1](#) or [3](#);

c. Cooperating in any investigation or other compliance action, or testifying in any proceeding under the DBA, Related Acts, this part, or [29 CFR part 1](#) or [3](#); or

d. Informing any other person about their rights under the DBA, Related Acts, this part, or [29 CFR part 1](#) or [3](#).

V. CONTRACT WORK HOURS AND SAFETY STANDARDS ACT

Pursuant to 29 CFR 5.5(b), the following clauses apply to any Federal-aid construction contract in an amount in excess of \$100,000 and subject to the overtime provisions of the Contract Work Hours and Safety Standards Act. These clauses shall be inserted in addition to the clauses required by 29 CFR 5.5(a) or 29 CFR 4.6. As used in this paragraph, the terms laborers and mechanics include watchpersons and guards.

1. Overtime requirements. No contractor or subcontractor contracting for any part of the contract work which may require or involve the employment of laborers or mechanics shall require or permit any such laborer or mechanic in any workweek in which he or she is employed on such work to work in excess of forty hours in such workweek unless such laborer or mechanic receives compensation at a rate not less than one and one-half times the basic rate of pay for all hours worked in excess of forty hours in such workweek. 29 CFR 5.5.

2. Violation; liability for unpaid wages; liquidated damages. In the event of any violation of the clause set forth in paragraph 1. of this section the contractor and any subcontractor responsible therefor shall be liable for the unpaid wages and interest from the date of the underpayment. In addition, such contractor and subcontractor shall be liable to the United States (in the case of work done under contract for the District of Columbia or a territory, to such District or to such territory), for liquidated damages. Such liquidated damages shall be computed with respect to each individual laborer or

mechanic, including watchpersons and guards, employed in violation of the clause set forth in paragraph 1. of this section, in the sum currently provided in 29 CFR 5.5(b)(2)* for each calendar day on which such individual was required or permitted to work in excess of the standard workweek of forty hours without payment of the overtime wages required by the clause set forth in paragraph 1. of this section.

* \$31 as of January 15, 2023 (See 88 FR 88 FR 2210) as may be adjusted annually by the Department of Labor, pursuant to the Federal Civil Penalties Inflation Adjustment Act of 1990.

3. Withholding for unpaid wages and liquidated damages

a. *Withholding process.* The FHWA or the contracting agency may, upon its own action, or must, upon written request of an authorized representative of the Department of Labor, withhold or cause to be withheld from the contractor so much of the accrued payments or advances as may be considered necessary to satisfy the liabilities of the prime contractor or any subcontractor for any unpaid wages; monetary relief, including interest; and liquidated damages required by the clauses set forth in this section on this contract, any other Federal contract with the same prime contractor, or any other federally assisted contract subject to the Contract Work Hours and Safety Standards Act that is held by the same prime contractor (as defined in § 5.2). The necessary funds may be withheld from the contractor under this contract, any other Federal contract with the same prime contractor, or any other federally assisted contract that is subject to the Contract Work Hours and Safety Standards Act and is held by the same prime contractor, regardless of whether the other contract was awarded or assisted by the same agency, and such funds may be used to satisfy the contractor liability for which the funds were withheld.

b. *Priority to withheld funds.* The Department has priority to funds withheld or to be withheld in accordance with Section IV paragraph 2.a. or paragraph 3.a. of this section, or both, over claims to those funds by:

- (1) A contractor's surety(ies), including without limitation performance bond sureties and payment bond sureties;
- (2) A contracting agency for its procurement costs;
- (3) A trustee(s) (either a court-appointed trustee or a U.S. trustee, or both) in bankruptcy of a contractor, or a contractor's bankruptcy estate;
- (4) A contractor's assignee(s);
- (5) A contractor's successor(s); or
- (6) A claim asserted under the Prompt Payment Act, [31 U.S.C. 3901](#)–3907.

4. Subcontracts. The contractor or subcontractor must insert in any subcontracts the clauses set forth in paragraphs 1. through 5. of this section and a clause requiring the subcontractors to include these clauses in any lower tier subcontracts. The prime contractor is responsible for compliance by any subcontractor or lower tier subcontractor with the clauses set forth in paragraphs 1. through 5. In the

event of any violations of these clauses, the prime contractor and any subcontractor(s) responsible will be liable for any unpaid wages and monetary relief, including interest from the date of the underpayment or loss, due to any workers of lower-tier subcontractors, and associated liquidated damages and may be subject to debarment, as appropriate.

5. Anti-retaliation. It is unlawful for any person to discharge, demote, intimidate, threaten, restrain, coerce, blacklist, harass, or in any other manner discriminate against, or to cause any person to discharge, demote, intimidate, threaten, restrain, coerce, blacklist, harass, or in any other manner discriminate against, any worker or job applicant for:

- a. Notifying any contractor of any conduct which the worker reasonably believes constitutes a violation of the Contract Work Hours and Safety Standards Act (CWHSSA) or its implementing regulations in this part;
- b. Filing any complaint, initiating or causing to be initiated any proceeding, or otherwise asserting or seeking to assert on behalf of themselves or others any right or protection under CWHSSA or this part;
- c. Cooperating in any investigation or other compliance action, or testifying in any proceeding under CWHSSA or this part; or
- d. Informing any other person about their rights under CWHSSA or this part.

VI. SUBLETTING OR ASSIGNING THE CONTRACT

This provision is applicable to all Federal-aid construction contracts on the National Highway System pursuant to 23 CFR 635.116.

1. The contractor shall perform with its own organization contract work amounting to not less than 30 percent (or a greater percentage if specified elsewhere in the contract) of the total original contract price, excluding any specialty items designated by the contracting agency. Specialty items may be performed by subcontract and the amount of any such specialty items performed may be deducted from the total original contract price before computing the amount of work required to be performed by the contractor's own organization (23 CFR 635.116).

a. The term "perform work with its own organization" in paragraph 1 of Section VI refers to workers employed or leased by the prime contractor, and equipment owned or rented by the prime contractor, with or without operators. Such term does not include employees or equipment of a subcontractor or lower tier subcontractor, agents of the prime contractor, or any other assignees. The term may include payments for the costs of hiring leased employees from an employee leasing firm meeting all relevant Federal and State regulatory requirements. Leased employees may only be included in this term if the prime contractor meets all of the following conditions: (based on longstanding interpretation)

- (1) the prime contractor maintains control over the supervision of the day-to-day activities of the leased employees;
- (2) the prime contractor remains responsible for the quality of the work of the leased employees;

(3) the prime contractor retains all power to accept or exclude individual employees from work on the project; and

(4) the prime contractor remains ultimately responsible for the payment of predetermined minimum wages, the submission of payrolls, statements of compliance and all other Federal regulatory requirements.

b. "Specialty Items" shall be construed to be limited to work that requires highly specialized knowledge, abilities, or equipment not ordinarily available in the type of contracting organizations qualified and expected to bid or propose on the contract as a whole and in general are to be limited to minor components of the overall contract. 23 CFR 635.102.

2. Pursuant to 23 CFR 635.116(a), the contract amount upon which the requirements set forth in paragraph (1) of Section VI is computed includes the cost of material and manufactured products which are to be purchased or produced by the contractor under the contract provisions.

3. Pursuant to 23 CFR 635.116(c), the contractor shall furnish (a) a competent superintendent or supervisor who is employed by the firm, has full authority to direct performance of the work in accordance with the contract requirements, and is in charge of all construction operations (regardless of who performs the work) and (b) such other of its own organizational resources (supervision, management, and engineering services) as the contracting officer determines is necessary to assure the performance of the contract.

4. No portion of the contract shall be sublet, assigned or otherwise disposed of except with the written consent of the contracting officer, or authorized representative, and such consent when given shall not be construed to relieve the contractor of any responsibility for the fulfillment of the contract. Written consent will be given only after the contracting agency has assured that each subcontract is evidenced in writing and that it contains all pertinent provisions and requirements of the prime contract. (based on long-standing interpretation of 23 CFR 635.116).

5. The 30-percent self-performance requirement of paragraph (1) is not applicable to design-build contracts; however, contracting agencies may establish their own self-performance requirements. 23 CFR 635.116(d).

VII. SAFETY: ACCIDENT PREVENTION

This provision is applicable to all Federal-aid construction contracts and to all related subcontracts.

1. In the performance of this contract the contractor shall comply with all applicable Federal, State, and local laws governing safety, health, and sanitation (23 CFR Part 635). The contractor shall provide all safeguards, safety devices and protective equipment and take any other needed actions as it determines, or as the contracting officer may determine, to be reasonably necessary to protect the life and health of employees on the job and the safety of the public and to protect property in connection with the performance of the work covered by the contract. 23 CFR 635.108.

2. It is a condition of this contract, and shall be made a condition of each subcontract, which the contractor enters into pursuant to this contract, that the contractor and any subcontractor shall not permit any employee, in performance of the contract, to work in surroundings or under conditions which are unsanitary, hazardous or dangerous to his/her health or safety, as determined under construction safety and

health standards (29 CFR Part 1926) promulgated by the Secretary of Labor, in accordance with Section 107 of the Contract Work Hours and Safety Standards Act (40 U.S.C. 3704). 29 CFR 1926.10.

3. Pursuant to 29 CFR 1926.3, it is a condition of this contract that the Secretary of Labor or authorized representative thereof, shall have right of entry to any site of contract performance to inspect or investigate the matter of compliance with the construction safety and health standards and to carry out the duties of the Secretary under Section 107 of the Contract Work Hours and Safety Standards Act (40 U.S.C. 3704).

VIII. FALSE STATEMENTS CONCERNING HIGHWAY PROJECTS

This provision is applicable to all Federal-aid construction contracts and to all related subcontracts.

In order to assure high quality and durable construction in conformity with approved plans and specifications and a high degree of reliability on statements and representations made by engineers, contractors, suppliers, and workers on Federal-aid highway projects, it is essential that all persons concerned with the project perform their functions as carefully, thoroughly, and honestly as possible. Willful falsification, distortion, or misrepresentation with respect to any facts related to the project is a violation of Federal law. To prevent any misunderstanding regarding the seriousness of these and similar acts, Form FHWA-1022 shall be posted on each Federal-aid highway project (23 CFR Part 635) in one or more places where it is readily available to all persons concerned with the project:

18 U.S.C. 1020 reads as follows:

"Whoever, being an officer, agent, or employee of the United States, or of any State or Territory, or whoever, whether a person, association, firm, or corporation, knowingly makes any false statement, false representation, or false report as to the character, quality, quantity, or cost of the material used or to be used, or the quantity or quality of the work performed or to be performed, or the cost thereof in connection with the submission of plans, maps, specifications, contracts, or costs of construction on any highway or related project submitted for approval to the Secretary of Transportation; or

Whoever knowingly makes any false statement, false representation, false report or false claim with respect to the character, quality, quantity, or cost of any work performed or to be performed, or materials furnished or to be furnished, in connection with the construction of any highway or related project approved by the Secretary of Transportation; or

Whoever knowingly makes any false statement or false representation as to material fact in any statement, certificate, or report submitted pursuant to provisions of the Federal-aid Roads Act approved July 11, 1916, (39 Stat. 355), as amended and supplemented;

Shall be fined under this title or imprisoned not more than 5 years or both."

IX. IMPLEMENTATION OF CLEAN AIR ACT AND FEDERAL WATER POLLUTION CONTROL ACT (42 U.S.C. 7606; 2 CFR 200.88; EO 11738)

This provision is applicable to all Federal-aid construction contracts in excess of \$150,000 and to all related subcontracts. 48 CFR 2.101; 2 CFR 200.327.

By submission of this bid/proposal or the execution of this contract or subcontract, as appropriate, the bidder, proposer, Federal-aid construction contractor, subcontractor, supplier, or vendor agrees to comply with all applicable standards, orders or regulations issued pursuant to the Clean Air Act (42 U.S.C. 7401-7671q) and the Federal Water Pollution Control Act, as amended (33 U.S.C. 1251-1387). Violations must be reported to the Federal Highway Administration and the Regional Office of the Environmental Protection Agency. 2 CFR Part 200, Appendix II.

The contractor agrees to include or cause to be included the requirements of this Section in every subcontract, and further agrees to take such action as the contracting agency may direct as a means of enforcing such requirements. 2 CFR 200.327.

X. CERTIFICATION REGARDING DEBARMENT, SUSPENSION, INELIGIBILITY AND VOLUNTARY EXCLUSION

This provision is applicable to all Federal-aid construction contracts, design-build contracts, subcontracts, lower-tier subcontracts, purchase orders, lease agreements, consultant contracts or any other covered transaction requiring FHWA approval or that is estimated to cost \$25,000 or more – as defined in 2 CFR Parts 180 and 1200. 2 CFR 180.220 and 1200.220.

1. Instructions for Certification – First Tier Participants:

a. By signing and submitting this proposal, the prospective first tier participant is providing the certification set out below.

b. The inability of a person to provide the certification set out below will not necessarily result in denial of participation in this covered transaction. The prospective first tier participant shall submit an explanation of why it cannot provide the certification set out below. The certification or explanation will be considered in connection with the department or agency's determination whether to enter into this transaction. However, failure of the prospective first tier participant to furnish a certification or an explanation shall disqualify such a person from participation in this transaction. 2 CFR 180.320.

c. The certification in this clause is a material representation of fact upon which reliance was placed when the contracting agency determined to enter into this transaction. If it is later determined that the prospective participant knowingly rendered an erroneous certification, in addition to other remedies available to the Federal Government, the contracting agency may terminate this transaction for cause of default. 2 CFR 180.325.

d. The prospective first tier participant shall provide immediate written notice to the contracting agency to whom this proposal is submitted if any time the prospective first tier participant learns that its certification was erroneous when submitted or has become erroneous by reason of changed circumstances. 2 CFR 180.345 and 180.350.

e. The terms "covered transaction," "debarred," "suspended," "ineligible," "participant," "person," "principal," and "voluntarily excluded," as used in this clause, are defined in 2 CFR Parts 180, Subpart I, 180.900-180.1020, and 1200. "First Tier Covered Transactions" refers to any covered transaction between a recipient or subrecipient of Federal funds and a participant (such as the prime or general contract). "Lower Tier Covered Transactions" refers to any covered transaction under a First Tier Covered Transaction (such as subcontracts). "First Tier Participant" refers to the participant who has entered into a covered transaction with a recipient or subrecipient of Federal funds (such as the prime or general contractor). "Lower Tier Participant" refers any participant who has entered into a covered transaction with a First Tier Participant or other Lower Tier Participants (such as subcontractors and suppliers).

f. The prospective first tier participant agrees by submitting this proposal that, should the proposed covered transaction be entered into, it shall not knowingly enter into any lower tier covered transaction with a person who is debarred, suspended, declared ineligible, or voluntarily excluded from participation in this covered transaction, unless authorized by the department or agency entering into this transaction. 2 CFR 180.330.

g. The prospective first tier participant further agrees by submitting this proposal that it will include the clause titled "Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion-Lower Tier Covered Transactions," provided by the department or contracting agency, entering into this covered transaction, without modification, in all lower tier covered transactions and in all solicitations for lower tier covered transactions exceeding the \$25,000 threshold. 2 CFR 180.220 and 180.300.

h. A participant in a covered transaction may rely upon a certification of a prospective participant in a lower tier covered transaction that is not debarred, suspended, ineligible, or voluntarily excluded from the covered transaction, unless it knows that the certification is erroneous. 2 CFR 180.300; 180.320, and 180.325. A participant is responsible for ensuring that its principals are not suspended, debarred, or otherwise ineligible to participate in covered transactions. 2 CFR 180.335. To verify the eligibility of its principals, as well as the eligibility of any lower tier prospective participants, each participant may, but is not required to, check the System for Award Management website (<https://www.sam.gov/>). 2 CFR 180.300, 180.320, and 180.325.

i. Nothing contained in the foregoing shall be construed to require the establishment of a system of records in order to render in good faith the certification required by this clause. The knowledge and information of the prospective participant is not required to exceed that which is normally possessed by a prudent person in the ordinary course of business dealings.

j. Except for transactions authorized under paragraph (f) of these instructions, if a participant in a covered transaction knowingly enters into a lower tier covered transaction with a person who is suspended, debarred, ineligible, or voluntarily excluded from participation in this transaction, in addition to other remedies available to the Federal Government, the department or agency may terminate this transaction for cause or default. 2 CFR 180.325.

2. Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion – First Tier Participants:

a. The prospective first tier participant certifies to the best of its knowledge and belief, that it and its principals:

(1) Are not presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from participating in covered transactions by any Federal department or agency, 2 CFR 180.335;.

(2) Have not within a three-year period preceding this proposal been convicted of or had a civil judgment rendered against them for commission of fraud or a criminal offense in connection with obtaining, attempting to obtain, or performing a public (Federal, State, or local) transaction or contract under a public transaction; violation of Federal or State antitrust statutes or commission of embezzlement, theft, forgery, bribery, falsification or destruction of records, making false statements, or receiving stolen property, 2 CFR 180.800;

(3) Are not presently indicted for or otherwise criminally or civilly charged by a governmental entity (Federal, State or local) with commission of any of the offenses enumerated in paragraph (a)(2) of this certification, 2 CFR 180.700 and 180.800; and

(4) Have not within a three-year period preceding this application/proposal had one or more public transactions (Federal, State or local) terminated for cause or default. 2 CFR 180.335(d).

(5) Are not a corporation that has been convicted of a felony violation under any Federal law within the two-year period preceding this proposal (USDOT Order 4200.6 implementing appropriations act requirements); and

(6) Are not a corporation with any unpaid Federal tax liability that has been assessed, for which all judicial and administrative remedies have been exhausted, or have lapsed, and that is not being paid in a timely manner pursuant to an agreement with the authority responsible for collecting the tax liability (USDOT Order 4200.6 implementing appropriations act requirements).

b. Where the prospective participant is unable to certify to any of the statements in this certification, such prospective participant should attach an explanation to this proposal. 2 CFR 180.335 and 180.340.

3. Instructions for Certification - Lower Tier Participants:

(Applicable to all subcontracts, purchase orders, and other lower tier transactions requiring prior FHWA approval or estimated to cost \$25,000 or more - 2 CFR Parts 180 and 1200). 2 CFR 180.220 and 1200.220.

a. By signing and submitting this proposal, the prospective lower tier participant is providing the certification set out below.

b. The certification in this clause is a material representation of fact upon which reliance was placed when this transaction was entered into. If it is later determined that the prospective lower tier participant knowingly rendered an erroneous certification, in addition to other remedies available to the Federal Government, the department, or agency with which

this transaction originated may pursue available remedies, including suspension and/or debarment.

c. The prospective lower tier participant shall provide immediate written notice to the person to which this proposal is submitted if at any time the prospective lower tier participant learns that its certification was erroneous by reason of changed circumstances. 2 CFR 180.365.

d. The terms "covered transaction," "debarred," "suspended," "ineligible," "participant," "person," "principal," and "voluntarily excluded," as used in this clause, are defined in 2 CFR Parts 180, Subpart I, 180.900 – 180.1020, and 1200. You may contact the person to which this proposal is submitted for assistance in obtaining a copy of those regulations. "First Tier Covered Transactions" refers to any covered transaction between a recipient or subrecipient of Federal funds and a participant (such as the prime or general contractor). "Lower Tier Covered Transactions" refers to any covered transaction under a First Tier Covered Transaction (such as subcontracts). "First Tier Participant" refers to the participant who has entered into a covered transaction with a recipient or subrecipient of Federal funds (such as the prime or general contractor). "Lower Tier Participant" refers any participant who has entered into a covered transaction with a First Tier Participant or other Lower Tier Participants (such as subcontractors and suppliers).

e. The prospective lower tier participant agrees by submitting this proposal that, should the proposed covered transaction be entered into, it shall not knowingly enter into any lower tier covered transaction with a person who is debarred, suspended, declared ineligible, or voluntarily excluded from participation in this covered transaction, unless authorized by the department or agency with which this transaction originated. 2 CFR 1200.220 and 1200.332.

f. The prospective lower tier participant further agrees by submitting this proposal that it will include this clause titled "Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion-Lower Tier Covered Transaction," without modification, in all lower tier covered transactions and in all solicitations for lower tier covered transactions exceeding the \$25,000 threshold. 2 CFR 180.220 and 1200.220.

g. A participant in a covered transaction may rely upon a certification of a prospective participant in a lower tier covered transaction that is not debarred, suspended, ineligible, or voluntarily excluded from the covered transaction, unless it knows that the certification is erroneous. A participant is responsible for ensuring that its principals are not suspended, debarred, or otherwise ineligible to participate in covered transactions. To verify the eligibility of its principals, as well as the eligibility of any lower tier prospective participants, each participant may, but is not required to, check the System for Award Management website (<https://www.sam.gov/>), which is compiled by the General Services Administration. 2 CFR 180.300, 180.320, 180.330, and 180.335.

h. Nothing contained in the foregoing shall be construed to require establishment of a system of records in order to render in good faith the certification required by this clause. The knowledge and information of participant is not required to exceed that which is normally possessed by a prudent person in the ordinary course of business dealings.

i. Except for transactions authorized under paragraph e of these instructions, if a participant in a covered transaction knowingly enters into a lower tier covered transaction with a person who is suspended, debarred, ineligible, or voluntarily

excluded from participation in this transaction, in addition to other remedies available to the Federal Government, the department or agency with which this transaction originated may pursue available remedies, including suspension and/or debarment. 2 CFR 180.325.

* * * * *

4. Certification Regarding Debarment, Suspension, Ineligibility and Voluntary Exclusion--Lower Tier Participants:

a. The prospective lower tier participant certifies, by submission of this proposal, that neither it nor its principals:

(1) is presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from participating in covered transactions by any Federal department or agency, 2 CFR 180.355;

(2) is a corporation that has been convicted of a felony violation under any Federal law within the two-year period preceding this proposal (USDOT Order 4200.6 implementing appropriations act requirements); and

(3) is a corporation with any unpaid Federal tax liability that has been assessed, for which all judicial and administrative remedies have been exhausted, or have lapsed, and that is not being paid in a timely manner pursuant to an agreement with the authority responsible for collecting the tax liability. (USDOT Order 4200.6 implementing appropriations act requirements)

b. Where the prospective lower tier participant is unable to certify to any of the statements in this certification, such prospective participant should attach an explanation to this proposal.

* * * * *

XI. CERTIFICATION REGARDING USE OF CONTRACT FUNDS FOR LOBBYING

This provision is applicable to all Federal-aid construction contracts and to all related subcontracts which exceed \$100,000. 49 CFR Part 20, App. A.

1. The prospective participant certifies, by signing and submitting this bid or proposal, to the best of his or her knowledge and belief, that:

a. No Federal appropriated funds have been paid or will be paid, by or on behalf of the undersigned, to any person for influencing or attempting to influence an officer or employee of any Federal agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with the awarding of any Federal contract, the making of any Federal grant, the making of any Federal loan, the entering into of any cooperative agreement, and the extension, continuation, renewal, amendment, or modification of any Federal contract, grant, loan, or cooperative agreement.

b. If any funds other than Federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any Federal agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with this Federal contract, grant, loan, or

cooperative agreement, the undersigned shall complete and submit Standard Form-LLL, "Disclosure Form to Report Lobbying," in accordance with its instructions.

2. This certification is a material representation of fact upon which reliance was placed when this transaction was made or entered into. Submission of this certification is a prerequisite for making or entering into this transaction imposed by 31 U.S.C. 1352. Any person who fails to file the required certification shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each such failure.

3. The prospective participant also agrees by submitting its bid or proposal that the participant shall require that the language of this certification be included in all lower tier subcontracts, which exceed \$100,000 and that all such recipients shall certify and disclose accordingly.

XII. USE OF UNITED STATES-FLAG VESSELS:

This provision is applicable to all Federal-aid construction contracts, design-build contracts, subcontracts, lower-tier subcontracts, purchase orders, lease agreements, or any other covered transaction. 46 CFR Part 381.

This requirement applies to material or equipment that is acquired for a specific Federal-aid highway project. 46 CFR 381.7. It is not applicable to goods or materials that come into inventories independent of an FHWA funded-contract.

When oceanic shipments (or shipments across the Great Lakes) are necessary for materials or equipment acquired for a specific Federal-aid construction project, the bidder, proposer, contractor, subcontractor, or vendor agrees:

1. To utilize privately owned United States-flag commercial vessels to ship at least 50 percent of the gross tonnage (computed separately for dry bulk carriers, dry cargo liners, and tankers) involved, whenever shipping any equipment, material, or commodities pursuant to this contract, to the extent such vessels are available at fair and reasonable rates for United States-flag commercial vessels. 46 CFR 381.7.

2. To furnish within 20 days following the date of loading for shipments originating within the United States or within 30 working days following the date of loading for shipments originating outside the United States, a legible copy of a rated, 'on-board' commercial ocean bill-of-lading in English for each shipment of cargo described in paragraph (b)(1) of this section to both the Contracting Officer (through the prime contractor in the case of subcontractor bills-of-lading) and to the Office of Cargo and Commercial Sealift (MAR-620), Maritime Administration, Washington, DC 20590. (MARAD requires copies of the ocean carrier's (master) bills of lading, certified onboard, dated, with rates and charges. These bills of lading may contain business sensitive information and therefore may be submitted directly to MARAD by the Ocean Transportation Intermediary on behalf of the contractor). 46 CFR 381.7.

**ATTACHMENT A - EMPLOYMENT AND MATERIALS
PREFERENCE FOR APPALACHIAN DEVELOPMENT
HIGHWAY SYSTEM OR APPALACHIAN LOCAL ACCESS
ROAD CONTRACTS (23 CFR 633, Subpart B, Appendix B)**

This provision is applicable to all Federal-aid projects funded under the Appalachian Regional Development Act of 1965.

1. During the performance of this contract, the contractor undertaking to do work which is, or reasonably may be, done as on-site work, shall give preference to qualified persons who regularly reside in the labor area as designated by the DOL wherein the contract work is situated, or the subregion, or the Appalachian counties of the State wherein the contract work is situated, except:

a. To the extent that qualified persons regularly residing in the area are not available.

b. For the reasonable needs of the contractor to employ supervisory or specially experienced personnel necessary to assure an efficient execution of the contract work.

c. For the obligation of the contractor to offer employment to present or former employees as the result of a lawful collective bargaining contract, provided that the number of nonresident persons employed under this subparagraph (1c) shall not exceed 20 percent of the total number of employees employed by the contractor on the contract work, except as provided in subparagraph (4) below.

2. The contractor shall place a job order with the State Employment Service indicating (a) the classifications of the laborers, mechanics and other employees required to perform the contract work, (b) the number of employees required in each classification, (c) the date on which the participant estimates such employees will be required, and (d) any other pertinent information required by the State Employment Service to complete the job order form. The job order may be placed with the State Employment Service in writing or by telephone. If during the course of the contract work, the information submitted by the contractor in the original job order is substantially modified, the participant shall promptly notify the State Employment Service.

3. The contractor shall give full consideration to all qualified job applicants referred to him by the State Employment Service. The contractor is not required to grant employment to any job applicants who, in his opinion, are not qualified to perform the classification of work required.

4. If, within one week following the placing of a job order by the contractor with the State Employment Service, the State Employment Service is unable to refer any qualified job applicants to the contractor, or less than the number requested, the State Employment Service will forward a certificate to the contractor indicating the unavailability of applicants. Such certificate shall be made a part of the contractor's permanent project records. Upon receipt of this certificate, the contractor may employ persons who do not normally reside in the labor area to fill positions covered by the certificate, notwithstanding the provisions of subparagraph (1c) above.

5. The provisions of 23 CFR 633.207(e) allow the contracting agency to provide a contractual preference for the use of mineral resource materials native to the Appalachian region.

6. The contractor shall include the provisions of Sections 1 through 4 of this Attachment A in every subcontract for work which is, or reasonably may be, done as on-site work.

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION
HONOLULU, HAWAII

SPECIAL PROVISIONS

These Special Provisions shall supplement and/or amend the applicable provisions of the Hawaii Standard Specifications for Road and Bridge Construction, 2005, hereinafter referred to as the "Standard Specifications".

Amend **Section 101 - TERMS, ABBREVIATIONS, AND DEFINITIONS** to read as follows:

“DIVISION 100 - GENERAL PROVISIONS

SECTION 101 - TERMS, ABBREVIATIONS, AND DEFINITIONS

101.01 Meaning of Terms. The specifications are generally written in the imperative mood. In sentences using the imperative mood, the subject, “the Contractor shall”, is implied. In the material specifications, the subject may also be the supplier, fabricator, or manufacturer supplying material, products, or equipment for use on the project. The word “will” generally pertains to decisions or actions of the State.

When a publication is specified, it refers to the most recent date of issue, including interim publications, before the bid opening date for the project, unless a specific date or year of issue is provided.

101.02 Abbreviations. Meanings of abbreviations used in the specifications, on the plans, or in other contract documents are as follows:

AAN	American Association of Nurserymen
AASHTO	American Association of State Highway and Transportation Officials
ACI	American Concrete Institute
ADA	Americans with Disabilities Act
ADAAG	Americans with Disabilities Act Accessibility Guidelines
AGC	Associated General Contractors of America
AIA	American Institute of Architects
AISC	American Institute of Steel Construction
AISI	American Iron and Steel Institute
ANSI	American National Standards Institute
APA	American Plywood Association

46	ARA	American Railway Association
47		
48	AREA	American Railway Engineering Association
49		
50	ASA	American Standards Association
51		
52	ASCE	American Society of Civil Engineers
53		
54	ASLA	American Society of Landscape Architects
55		
56	ASTM	American Society for Testing and Materials
57		
58	AWG	American Wire Gauge
59		
60	AWPA	American Wood Preserver's Association
61		
62	AWS	American Welding Society
63		
64	AWWA	American Water Works Association
65		
66	BMP	Best Management Practice
67		
68	CCO	Contract Change Order
69		
70	CFR	Code of Federal Regulations
71		
72	CRSI	Concrete Reinforcing Steel Institute
73		
74	DCAB	Disability and Communication Access Board, Department of
75		Health, State of Hawaii
76		
77	DOTAX	Department of Taxation, State of Hawaii
78		
79	EPA	U.S. Environmental Protection Agency
80		
81	FHWA	Federal Highway Administration,
82		U.S. Department of Transportation
83		
84	FSS	Federal Specifications and Standards,
85		General Services Administration, U.S. Department of Defense
86		
87	HAR	Hawaii Administrative Rules
88		
89	HDOT	Department of Transportation, State of Hawaii
90		

91	HIOSH	Occupational Safety and Health, Department of Labor and
92		Industrial Relations, State of Hawaii
93		
94	HMA	Hot Mix Asphalt
95		
96	HRS	Hawaii Revised Statutes
97		
98	ICEA	Insulated Cable Engineers Association (formerly IPCEA)
99		
100	IMSA	International Municipal Signal Association
101		
102	IRS	Internal Revenue Service
103		
104	ITE	Institute of Transportation Engineers
105		
106	MUTCD	Manual on Uniform Traffic Control Devices for Streets and
107		Highways, FHWA, U.S. Department of Transportation
108		
109	NCHRP	National Cooperative Highway Research Program
110		
111	NEC	National Electric Code
112		
113	NEMA	National Electrical Manufacturers Association
114		
115	NFPA	National Forest Products Association
116		
117	NPDES	National Pollutant Discharge Elimination System
118		
119	OSHA	Occupational Safety and Health Administration/Act,
120		U.S. Department of Labor
121		
122	SAE	Society of Automotive Engineers
123		
124	SI	International Systems of Units
125		
126	UFAS	Uniform Federal Accessibility Standards
127		
128	UL	Underwriter's Laboratory
129		
130	USGS	U.S. Geological Survey
131		
132	VECP	Value Engineering Cost Proposal
133		
134		

101.03 Definitions. Whenever the following words, terms, or pronouns are used in the contract documents, unless otherwise prescribed therein and without regards to the use or omission of uppercase letters, the intent and meaning shall be interpreted as follows:

Addendum (plural - Addenda) - A written or graphic document, including drawings and specifications, issued by the Director during the bidding period. This document modifies or interprets the bidding documents by additions, deletions, clarifications or corrections.

Addition (to the contract sum) - Amount added to the contract sum by change order.

Advertisement - A public announcement inviting bids for work to be performed or materials to be furnished.

Amendment - A written document issued to amend the existing contract between the State and Contractor and properly executed by the Contractor and Director.

Award - Written notification to the bidder that the bidder has been awarded a contract.

Bad Weather Day (or Unworkable Day) - A day when weather or other conditions prevent a minimum of four hours of work with the Contractor's normal work force on critical path activities at the site.

Bag - 94 pounds of cement.

Barrel - 376 pounds of cement.

Base Course - The layer or layers of specified material or selected material of a designed thickness placed on a subbase or subgrade to support a surface course.

Basement Material - The material in excavation or embankments underlying the lowest layer of subbase, base, pavement, surfacing or other specified layer.

Bid - See Proposal.

Bidder - An individual, partnership, corporation, joint venture or other legal entity submitting, directly or through a duly authorized representative or agent, a proposal for the work or construction contemplated.

Bidding Documents (or Solicitation Documents) - The published solicitation notice, bid requirements, bid forms and the proposed contract documents including all addenda and clarifications issued prior to receipt of the bid.

Bid Security - The security furnished by the bidder from which the State may recover its damages in the event the bidder breaches its promise to enter into a contract with the State, or fails to execute the required bonds covering the work contemplated, if its proposal is accepted.

Blue Book - EquipmentWatch Cost Recovery (formerly known as EquipmentWatch Rental Rate Blue Book), available from EquipmentWatch, a division of Penton, Inc.

Calendar Day - See Day.

Change Order (or Contract Change Order) - A written order signed by the Engineer issued with or without the consent of the Contractor directing changes in the work, contract time or contract price. The purposes of a change order include, but are not limited to (1) establishing a price or time adjustment for changes in the work; (2) establishing full payment for direct, indirect, and consequential costs, including costs of delay; (3) establishing price adjustment or time adjustment for work covered and affected by one or more field orders; or (4) settling Contractor's claims for direct, indirect, and consequential costs, or for additional contract time, in whole or in part.

Completion - See Substantial Completion and Final Completion.

Completion Date - The date specified by the contract for the completion of all work on the project or of a designated portion of the project.

Comptroller - the Comptroller of the State of Hawaii, Department of Accounting and General Services.

Contract - The written agreement between the Contractor and the State, by which the Contractor shall provide all labor, equipment, and materials and perform the specified work within the contract time stipulated, and by which the State of Hawaii is obligated to compensate the Contractor at the prices set forth in the contract documents.

Contract Certification Date - The Date on which the Deputy Comptroller for the State of Hawaii (or authorized representative) signs the Contract Certification.

Contract Completion Date - The calendar day on which all work on the project, required by the contract, must be completed. See CONTRACT TIME.

Contract Documents - The contract, solicitation, addenda, notice to bidders, Contractor's bid proposal (including wage schedule, list of subcontractors and other documentations accompanying the bid), notice to proceed, bonds, general provisions, special provisions, specifications, drawings, all modifications, all written amendments, change orders, field orders, orders for minor changes in the work, the Engineer's written interpretations and clarifications issued on or after the effective date of the contract.

Contract Item (Pay Item) - A specific unit of work for which there is a price in the contract.

Contract Modification (Modification) - A change order that is mutually agreed to and signed by the parties to the contract.

Contract Price - The amount designated on the face of the contract for the performance of work.

Contract Time (or Contract Duration) - The number of calendar or working days provided for completion of the contract, inclusive of authorized time extensions. Contract time shall commence on the Start Work Date and end on the Substantial Completion Date. If in lieu of providing a number of calendar or working days, the contract requires completion by a certain date, the work shall be completed by that date.

Contracting Officer - See Engineer.

Contractor - Any individual, partnership, firm, corporation, joint venture, or other legal entity undertaking the execution of the work under the terms of the contract with the State.

Critical Path - Longest logical sequence of activities that must be completed on schedule for the entire project to be completed on schedule.

Day - Any day shown on the calendar, beginning at midnight and proceeding up to, but not including, midnight the following day. If no designation of calendar or working day is made, "day" shall mean calendar day.

Department - The Department of Transportation of the State of Hawaii (abbreviated HDOT).

Director - The Director of the HDOT acting directly or through duly authorized representatives.

Plans (or Drawings) - The contract drawings in graphic or pictorial form including the notes, tables and other notations thereon indicating the design, location, character, dimensions, and details of the work.

Engineer - The Highway Administrator, Highways Division, HDOT, or the authorized person delegated to act on the Administrator's behalf.

Equipment - All machinery, tools, and apparatus needed to complete the contract.

Field Order - A written order issued by the Engineer or the Engineer's authorized representative to the Contractor requiring a change or changes to the contract work. A field order may (1) establish a price adjustment or time adjustment; or (2) may declare that no adjustment will be made to contract price or contract time; or (3) may request the Contractor to submit a proposal for an adjustment to the contract price or contract time.

Final Acceptance - The Status of the project when the Engineer finds that the Contractor has satisfactorily completed all contract work in compliance with the contract including all plant establishment requirements, and all the materials have been accepted by the State.

Final Completion - The date set by the Director that all work required by the contract has been completed in full compliance with the contract documents.

Final Inspection - Inspection where all contract items (with the exception of Planting Period and Plant Establishment Period) are accepted by the Engineer. Substantial Completion will be issued by the Engineer based on the satisfactory results of the Final Inspection.

Float - The amount of time between when an activity can start and when an activity must start, i.e., the time available to complete non-critical activities required for the performance of the work without affecting the critical path.

Guarantee - Legally enforceable assurance of the duration of satisfactory performance of quality of a product or work.

Hawaii Administrative Rules - Rules adopted by the State in accordance with Chapter 91 of the Hawaii Revised Statutes, as amended.

HAWAII ePROCUREMENT SYSTEM (HlePRO) - The State of Hawaii eProcurement System for issuing solicitations, receiving proposals and responses, and issuing notices of award.

Highway (Street, Road, or Roadway) - A public way within a right-of-way designed, intended, and set aside for use by vehicles, bicyclists, or pedestrians.

Highways Division - The Highways Division of the Hawaii Department of Transportation constituted under the laws of Hawaii for the administration of highway work.

Holidays - The days of each year which are set apart and established as State holidays pursuant to Chapter 8 of the Hawaii Revised Statutes, as amended.

Inspector - The Engineer's authorized representative assigned to make detailed inspections of contract performance, prescribed work, and materials supplied.

Laboratory - The testing laboratory of the Highways Division or other testing laboratories that may be designated by the Engineer.

Laws - All Federal, State, and local laws, executive orders and regulations having the force of law.

Leveling Course - An aggregate mixture course of variable thickness used to restore horizontal and vertical uniformity to existing pavements or shoulders.

Liquidated Damages - The amount prescribed in Subsection 108.08 - Liquidated Damages for Failure to Complete the Work or Portions of the Work on Time, to be paid to the State or to be deducted from any payments payable to or, which may become payable to the Contractor.

Lump Sum (LS) - When used as a payment method means complete payment for the item of work described in the contract documents.

Material - Any natural or manmade substance or item specified in the contract to be incorporated in the work.

Notice to Bidders - The advertisement for proposals for all work or materials on which bids are required. Such advertisement will indicate the location of the work to be done or the character of the material to be furnished and the time and place for the opening of proposals.

Notice to Proceed - Written notice from the Engineer to the Contractor identifying the date on which the Contractor is to begin procuring materials and required permits and adjusting work forces, equipment, schedules, etc. prior to beginning physical work.

Pavement - The uppermost layer of material placed on the traveled way or shoulders or both. Pavement and surfacing may be interchangeable.

Pavement Structure - The combination of subbase, base, pavement, surfacing or other specified layer of a roadway constructed on a subgrade to support the traffic load.

Payment Bond - The security executed by the Contractor and surety or sureties furnished to the Department to guarantee payment by the Contractor to laborers, material suppliers and subcontractors in accordance with the terms of the contract.

Physical Work - Physical construction activities on the project site or at appurtenant facilities including staging areas. It includes; (i) building or installing any structures or facilities including, but not limited to sign erection; BMP installation; field office site grading and building; (ii) removal, adjustment, or demolition of physical obstructions on site; (iii) any ground breaking activities; and (iv) any utility work. It does not include pre-construction environmental testing (such as water quality baseline measurements) that may be required as part of contract.

Pre-Final Inspection - Inspection scheduled when Contractor notifies Engineer that all physical work on the project, with the exception of planting period and plant establishment period, has been completed. Notice from Contractor of substantial completion will suspend contract time until Contractor receives punchlist from Engineer.

Profile Grade - The elevation or gradient of a vertical plane intersecting the top surface of the proposed pavement.

Project Acceptance Date - The calendar day on which the Engineer accepts the project as completed. See Final Completion.

Proposal (Bid) - The executed document submitted by a Bidder in response to a solicitation request, to perform the work required by the proposed contract documents, for the price quoted and within the time allotted.

Public Traffic - Vehicular or pedestrian movement on a public way.

Punchlist - A list compiled by the Engineer specifying work yet to be completed or corrected by the Contractor in order to substantially complete the contract.

Questionnaire - The specified forms on which the bidder shall furnish required information as to its ability to perform and finance the work.

Request for Change Proposal - A written notice from the Engineer to the Contractor requesting that the Contractor provide a price and/or time proposal for contemplated changes preparatory to the issuance of a field order or change order.

Right-of-Way - Land, property, or property interests acquired by a government agency for, or devoted to transportation purposes.

Roadbed - The graded portion of a highway within top and side slopes, prepared as a foundation for the pavement structure and shoulders.

Roadside - The area between the outside edges of the shoulders and the right-of-way boundaries. Unpaved median areas between inside shoulders of divided highways and infield areas of interchanges are included.

Section and Subsection - Section or subsection shall be understood to refer to these specifications unless otherwise specified.

Shop Drawings - All drawings, diagrams, illustrations, schedules and other data or information which are specifically prepared or assembled by or for the Contractor and submitted by the Contractor to illustrate some portion of the work.

Shoulder - The portion of the roadway next to the traveled way for: accommodation of stopped vehicles, placement of underground facilities, emergency use, and lateral support of base and surface courses.

Sidewalk - That portion of the roadway primarily constructed for use by pedestrians.

Solicitation - An invitation to bid or request for proposals or any other document issued by the Department to solicit bids or offers to perform a contract. The solicitation may indicate the time and place to receive the bids or offers and the location, nature and character of the work, construction or materials to be provided.

Specifications - Compilation of provisions and requirements to perform prescribed work.

(A) **Standard Specifications.** Specifications by the State intended for general application and repetitive use.

(B) **Special Provisions.** Revisions and additions to the standard specifications applicable to an individual project.

Standard Plans - Drawings provided by the State for specific items of work approved for repetitive use.

State - The State of Hawaii, its Departments and agencies, acting through its authorized representative(s).

State Waters – All waters, fresh, brackish, or salt, around and within the State, including, but not limited to, coastal waters, streams, rivers, drainage ditches, ponds, reservoirs, canals, ground waters, and lakes; provided that drainage ditches, ponds, and reservoirs required as a part of a water pollution control system are excluded.

Start Work Date - Date on which Contractor begins physical work on the contract. This date shall also be the beginning of Contract Time.

Structures - Bridges, culverts, catch basins, drop inlets, retaining walls, cribbing, manholes, endwalls, buildings, sewers, service pipes, underdrains, foundation drains, and other such features that may be encountered in the work.

Subbase - A layer of specified material of specified thickness between the subgrade and a base.

Subcontract - Any written agreement between the Contractor and its subcontractors which contains the conditions under which the subcontractor is to perform a portion of the work for the Contractor.

Subcontractor - An individual, partnership, firm, corporation, joint venture or other legal entity, **as licensed or required to be licensed under** Chapter 444, Hawaii Revised Statutes, as amended, which enters into an agreement with the Contractor to perform a portion of the work.

Subgrade - The top surface of completed earthwork on which subbase, base, surfacing, pavement, or a course of other material is to be placed.

Substantial Completion - The Status of the project when the Contractor has completed the work, except for the planting period and plant establishment period, and each of the following requirements are met:

- (1) All traffic lanes (including shoulders, ramps, sidewalks and bike paths) are in their final configuration as designed and the final wearing surface has been installed;
- (2) All operational and safety devices have been installed in accordance with the contract documents including guardrails, end treatments, traffic barriers, required signs and pavement markings, drainage, parapet, and bridge and pavement structures;
- (3) All required illumination and lighting for normal and safe use and operation is installed and functional in accordance with the contract documents;
- (4) All utilities and services are connected and working;
- (5) The need for temporary traffic controls or lane closures at any time has ceased, except for lane closures required for routine maintenance;
- (6) The building, structure, improvement or facility can be used for its intended purpose.

Substantial Completion Date - The date the Substantial Completion is granted by the Engineer in Writing and Contract Time stops.

Superintendent - The employee of the Contractor who is responsible for all the work and is a Contractor's agent for communications to and from the State.

Surety - The qualified individual, firm or corporation other than the Contractor, which executes a bond with and for the Contractor to insure its acceptable performance of the contract.

Surfacing - The uppermost layer of material placed on the traveled way or shoulders. This term is used interchangeably with pavement.

Traveled Way - The portion of the roadway for the movement of vehicles, exclusive of shoulders.

Unsuitable Material - Materials that contain organic matter, muck, humus, peat, sticks, debris, chemicals, toxic matter, or other deleterious materials not suitable for use in earthwork.

Utility - A line, facility, or system for producing, transmitting, or distributing communications, power, electricity, heat, gas, oil, water, steam, waste, or storm water.

Utility Owner - The entity, whether private or owned by a State, Federal, or County governmental body, that has the power and responsibility to grant approval for, or undertake construction work involving a particular utility.

Water Pollutant - Dredged spoil, solid refuse, incinerator residue, sewage, garbage, sewage sludge, munitions, chemical waste, biological materials, radioactive materials, heat, wrecked or discarded equipment, rock, sand, soil, sediment, cellar dirt and industrial, municipal, and agricultural waste.

Water Pollution - (1) Such contamination or other alteration of the physical, chemical, or biological properties of any state waters, including change in temperature, taste, color, turbidity, or odor of the waters, or (2) Such discharge of any liquid, gaseous, solid, radioactive, or other substances into any state waters, as will or is likely to create a nuisance or render such waters unreasonably harmful, detrimental, or injurious to public health, safety, or welfare, including harm, detriment, or injury to public water supplies, fish and aquatic life and wildlife, recreational purposes and agricultural and industrial research and scientific uses of such waters or as will or is likely to violate any water quality standards, effluent standards, treatment and pretreatment standards, or standards of performance for new sources adopted by the Department of Health.

Work - The furnishing of all labor, material, equipment, and other incidentals necessary or convenient for the successful execution of all the duties and obligations imposed by the contract.

Working Day - A calendar day in which a Contractor is capable of working four or more hours with its normal work force, exclusive of:

548 **(1)** Saturdays, Sundays, and recognized legal State holidays and such
549 other days specified by the contract documents as non-working days,
550

551 **(2)** Day in which the Engineer suspends work for four or more hours
552 through no fault of the Contractor.”
553

554

555

556

557

END OF SECTION 101

1 Make this section a part of the Standard Specifications:

2
3 **"SECTION 102 - BIDDING REQUIREMENTS AND CONDITIONS**

4
5
6 **102.01 Prequalification of Bidders.** Prospective bidders shall be capable of
7 performing the work for which they are bidding.

8
9 In accordance with HRS Chapter 103D-310, the Department may require
10 any prospective bidder to submit answers to questions contained in the 'Standard
11 Qualification Questionnaire For Prospective Bidders On Public Works Contracts'
12 furnished by the Department, properly executed and notarized, setting forth a
13 complete statement of the experience of such prospective bidder and its
14 organization in performing similar work and a statement of the equipment
15 proposed to be used, together with adequate proof of the availability of such
16 equipment. Whenever it appears to the Department, from answers to the
17 questionnaire or otherwise, that the prospective bidder is not fully qualified and
18 able to perform the intended work, the Department will, after affording the
19 prospective bidder an opportunity to be heard and if still of the opinion that the
20 bidder is not fully qualified to perform the work, refuse to receive or consider any
21 bid offered by the prospective bidder. All information contained in the answers to
22 the questionnaire shall be kept confidential. Questionnaire so submitted shall be
23 returned to the bidders after serving their purpose.

24
25 No person, firm or corporation may bid where (1) the person, firm, or
26 corporation, or (2) a corporation owned substantially by the person, firm, or
27 corporation, or (3) a substantial stockholder or an officer of the corporation, or (4)
28 a partner or substantial investor in the firm is in arrears in payments owed to the
29 State or its political subdivisions or is in default as a surety or failure to do
30 faithfully and diligently previous contracts with the State.

31
32 **102.02 Contents of Proposal Forms.** The Department will furnish
33 prospective bidders with proposal forms posted in HlePRO stating:

- 34
35 (1) The location,
36
37 (2) Description of the proposed work,
38
39 (3) The approximate quantities,
40
41 (4) Items of work to be done or materials to be furnished,
42
43 (5) A schedule of items, and
44
45 (6) The time in which the work shall be completed.
46

Papers bound with or attached to the proposal form are part of the proposal. The bidder shall not detach or alter the papers bound with or attached to the proposal when the bidder submits its proposal through HlePRO.

Also, the bidder shall consider other documents including the plans and specifications a part of the proposal form whether attached or not.

102.03 (Unassigned).

102.04 Estimated Quantities. The quantities shown in the contract are approximate and are for the comparison of bids only. The actual quantity of work may not correspond with the quantities shown in the contract. The Department will make payment to the Contractor for unit price items in accordance with the contract for only the following:

(1) Actual quantities of work done and accepted, not the estimated quantities; or

(2) Actual quantities of materials furnished, not the estimated quantities.

The Department may increase, decrease, or omit each scheduled quantities of work to be done and materials to be furnished. When the Department increases or decreases the estimated quantity of a contract item by more than 15% the Department will make payment for such items in accordance with Subsection 104.06 - Methods of Price Adjustment.

102.05 Examination of Contract and Site of Work. The bidder shall examine carefully the site of the proposed work and contract before submitting a proposal.

By the act of submitting a bid for the proposed contract, the bidder warrants that:

(1) The bidder and its Subcontractors have reviewed the contract documents and found them free from ambiguities and sufficient for the purpose intended;

(2) The bidder and its workers, employees and subcontractors have the skills and experience in the type of work required by the contract documents bid upon;

(3) Neither the bidder nor its employees, agents, suppliers or subcontractors have relied upon verbal representations from the Department, its employees or agents, including architects, engineers or consultants, in assembling the bid figure; and

(4) The basis for the bid figure are solely on the construction contract documents.

Also, the bidder warrants that the bidder has examined the site of the work. From its investigations, the bidder acknowledges satisfaction on:

- (1) The nature and location of the work;
- (2) The character, quality, and quantity of materials;
- (3) The difficulties to be encountered; and
- (4) The kind and amount of equipment and other facilities needed;

Subsurface information or hydrographic survey data furnished are for the bidders' convenience only. The data and information furnished are the product of the Department's interpretation gathered in investigations made at the specific locations. These conditions may not be typical of conditions at other locations within the project area or that such conditions remain unchanged. Also, conditions found at the time of the subsurface explorations may not be the same conditions when work starts. The bidder shall be solely responsible for assumptions, deductions, or conclusions the bidder may derive from the subsurface information or data furnished.

If the Engineer determines that the natural conditions differ from that originally anticipated or contemplated by the Contractor in the items of excavation, the State may treat the difference in natural conditions, as falling within the meaning of Subsection 104.02 – Changes.

102.06 Preparation of Proposal. The submittal of its proposal shall be on forms furnished by the Department. The bidder shall specify in words or figures:

- (1) A unit price for each pay item with a quantity given;
- (2) The products of the respective unit prices and quantities
- (3) The lump sum amount; and
- (4) The total amount of the proposal obtained by adding the amounts of the several items.

The words and figures shall be in ink or typed. If a discrepancy occurs between the prices written in words and those written in figures, the prices written in words shall govern.

138 When an item in the proposal contains an option to be made, the bidder
139 shall choose in accordance with the contract for that particular item.
140 Determination of an option will not permit the Contractor to choose again.
141

142 The bidder shall sign the proposal properly in ink. A duly authorized
143 representatives of the bidder or by an agent of the bidder legally qualified and
144 acceptable to the Department shall sign, including one or more partners of the
145 bidder and one or more representatives of each entity comprising a joint venture.
146

147 When an agent, other than the officer(s) of a corporation authorized to
148 sign contracts for the corporation or a partner of a partnership, signs the
149 proposals, a 'Power of Attorney' shall be on file with the Department or submitted
150 with the proposal. Otherwise, the Department will reject the proposal as irregular
151 and unauthorized.
152

153 The bidder shall submit acceptable evidence of the authority of the
154 partner, member(s) or officer(s) to sign for the partnership, joint venture, or
155 corporation respectively with the proposal. Otherwise, the Department will reject
156 the proposal as irregular and unauthorized.
157

158 **102.07 Irregular Proposals.** The Department may consider proposals
159 irregular and may reject the proposals for the following reasons:
160

161 (1) The proposal is a form not furnished by the Department, altered, or
162 detached;
163

164 (2) The proposal contains unauthorized additions, conditions, or
165 alternates. Also, the proposal contains irregularities that may tend to
166 make the proposal incomplete, indefinite, or ambiguous to its meaning;
167

168 (3) The bidder adds provisions reserving the right to accept or reject an
169 award. Also, the bidder adds provisions into a contract before an award;
170

171 (4) The proposal does not contain a unit price for each pay item listed
172 except authorized optional pay items; and
173

174 (5) Prices for some items are out of proportion to the prices for other
175 items.
176

177 (6) If in the opinion of the Director, the bidder and its listed
178 subcontractors do not have the Contractor's licenses or combination of
179 Contractor's licenses necessary to complete the work.
180

Where the prospective bidder is bidding on multiple projects simultaneously and the proposal limits the maximum gross amount of awards that the bidder can accept at one bid letting, the proposal is not irregular if the limit on the gross amount of awards is clear, and the Department selects the awards that can be given.

102.08 Proposal Guaranty. The Department will not consider a proposal of \$25,000 or more unless accompanied by:

(1) A deposit of legal tender; or

(2) A valid surety bid bond, underwritten by a company licensed to issue bonds in the State of Hawaii, in the form and composed, substantially, with the same language as provided herewith and signed by both parties; or

(3) A certificate of deposit, share certificate, cashier's check, treasurer's check, teller's check, or official check drawn by, or a certified check accepted by and payable on demand to the State by a bank, savings institution, or credit union insured by the Federal Deposit Insurance Corporation (FDIC) or the National Credit Union Administration (NCUA).

(a) The bidder may use these instruments only to a maximum of \$100,000.

(b) If the required security or bond amount totals over \$100,000 more than one instrument not exceeding \$100,000 each and issued by different financial institutions shall be acceptable.

(c) The instrument shall be made payable at sight to the Department.

(d) If bidder elects options (1) or (3) above for its bid security, said bid security shall be in its original form and shall be submitted before the bid deadline to the Contract Office, Department of Transportation, Aliiaimoku Hale, 869 Punchbowl Street, Room 105, Honolulu, Hawaii 96813. Original surety bid bonds do not need to be submitted to the Contracts Office. Bidders are reminded that a copy of it surety bid bond shall be included with its bid submitted and uploaded to HlePRO.

In accordance with HRS Chapter 103D-323, the above shall be in a sum not less than 5% of the amount bid.

102.09 Delivery of Proposal. Bidders shall submit and upload the complete proposal to HlePRO prior to the bid opening date and time. Proposals received after said due date and time shall not be considered. Any additional support documents explicitly designated as confidential and/or proprietary shall be uploaded as a separate file to HlePRO. Bidders shall not include confidential and/or proprietary documents with the proposal. The record of each bidder and respective bid shall be open to public inspection. Original (wet ink, hard copy) proposal documents are not required to be submitted. Contract award shall be based on evaluation of proposals submitted and uploaded to HlePRO.

FAILURE TO UPLOAD THE COMPLETE PROPOSAL TO HlePRO SHALL BE GROUNDS FOR REJECTION OF THE BID.

If there is a conflict between the specification document and the HlePRO solicitation, the specifications shall govern and control, unless otherwise specified.

102.10 Withdrawal or Revision of Proposals. Bids may be modified or withdrawn prior to the bid opening date and time. Withdrawal or revision of proposal shall be completed and submitted and uploaded to HlePRO prior to the bid opening date and time.

102.11 Public Opening of Proposals. Not applicable.

102.12 Disqualification of Bidders. The Department may disqualify a bidder and reject its proposal for the following reasons:

- (1) Submittal of more than one proposal whether under the same or different name.
- (2) Evidence of collusion among bidders. The Department will not recognize participants in collusion as bidders for any future work of the Department until such participants are reinstated as qualified bidders.
- (3) Lack of proposal guaranty.
- (4) Submittal of an unsigned or improperly signed proposal.
- (5) Submittal of a proposal without a listing of subcontractors or containing only a partial or incomplete listing of subcontractors.
- (6) Submittal of an irregular proposal in accordance with Subsection 102.07 - Irregular Proposals.
- (7) Evidence of assistance from a person who has been an employee of the agency within the preceding two years and who participated while in

State office or employment in the matter with which the contract is directly concerned, pursuant to HRS Chapter 84-15.

(8) Suspended or debarred in accordance with HRS Chapter 104-25.

(9) Failure to complete the prequalification questionnaire, if applicable.

(10) Failure to attend the mandatory pre-bid meeting, if applicable.

102.13 Material Guaranty. The successful bidder may be required to furnish a statement of the composition, origin, manufacture of materials, and samples.

102.14 Substitution of Materials and Equipment Before Bid Opening. See Subsection 106.13 for Substitution Of Materials and Equipment After Bid Opening.

(A) General. When brand names of materials or equipment are specified in the contract documents, they are to indicate a quality, style, appearance, or performance and not to limit competition. The bidder shall base its bid on one of the specified brand names unless alternate brands are qualified as equal or better in an addendum. As specified in the Notice to Bidders, all requests shall be posted as a question in HlePRO under the "Question and Answer" tab. Supporting documents for specific request shall be emailed to the Project Manager specified in the Notice to Bidders. Request must be posted in HlePRO and supporting documents received by the Project Manager no later than eighteen (18) calendar days before the bid opening date.

An addendum will be issued to inform all prospective bidders of any accepted substitution in accordance with Subsection 102.17 – Addenda.

(B) Statement of Variances. The statement of variances must list all features of the proposed substitution that differ from the contract documents and must further certify that the substitution has no other variant features. The brochure and information submitted shall be clearly marked showing make, model, size, options, and any other features requested by the Engineer and must include sufficient evidence to evaluate each feature listed as a variance. A request will be denied if submitted without sufficient evidence. If after installing the substituted product, an unlisted variance is discovered, the Contractor shall immediately replace the product with a specified product at no increase in contract price and contract time.

(C) Substitution Denial. Any substitution request not complying with the above requirements will be denied.

102.15 Preferences. Preferences shall not apply to this project.

319
320 **102.16 Certification for Safety and Health Program for Bids in excess of**
321 **\$100,000.** In accordance with HRS Chapter 396-18, the bidder or offeror, by
322 signing and submitting this proposal, certifies that a written safety and health plan
323 for this project will be available and implemented by the notice to proceed date
324 for this project. Details of the requirements of this plan may be obtained from the
325 State Department of Labor and Industrial Relations, Occupational Safety and
326 Health Division (HIOSH).

327
328 **102.17 Addenda.** Addenda issued shall become part of the contract
329 documents. Addenda to the bid documents will be provided to all prospective
330 bidders via HlePRO. Each addendum shall be an addition to the contract
331 documents. The terms and requirements of the bid documents (i.e., drawings,
332 specifications and other bid and contract documents) cannot be changed prior to
333 the bid opening except by a duly issued addendum.”
334

335
336 **END OF SECTION 102**

1 Make this section a part of the Standard Specifications:

2
3 **“SECTION 103 - AWARD AND EXECUTION OF CONTRACT**
4

5
6 **103.01 Consideration of Proposals.** The Department will compare the
7 proposals in terms of the summation of the products of the approximate quantities
8 and the unit bid prices after the submittal date and time established in HlePRO. If
9 a discrepancy occurs between the unit bid price and the bid price, the unit bid price
10 shall govern.

11
12 The “Buy America” provisions in the Surface Transportation Assistance Act
13 of 1982 is applicable to Federal-aid projects. Bidders may submit a bid based
14 upon the furnishing and use of domestic steel or foreign steel. Manufacturing
15 processes for domestic steel shall occur in the United States.

16
17 The Department reserves the right to reject proposals, waive technicalities
18 or advertise for new proposals, if the rejection, waiver, or new advertisement favors
19 the Department.

20
21 **103.02 Award of Contract.** The award of contract, if it be awarded, will be
22 made within 60 calendar days after the opening of bids, to the lowest responsible
23 and responsive bidder whose proposal complies with all the prescribed
24 requirements. The Department may request the bidders to allow the Department
25 to consider the bids for the issuance of an award beyond the 60-calendar day
26 period. Agreement to such an extension must be made by a bidder in writing. Only
27 bidders who have agreed to such an extension will be eligible for the award. No
28 response to request shall mean the bidder shall no longer be eligible for award.

29
30 **(1) Requirement for Award.** The Bidder, as proof of compliance
31 with the requirements of section 103D-310(c), HRS, upon award of
32 a contract made pursuant to section 103D-302, HRS, shall provide
33 the documents listed below. The documents shall be submitted
34 promptly to the Department. If a valid certificate/clearance is not
35 submitted on a timely basis upon award, the Bidder may be deemed
36 non-responsible. See also Subsection 108.03 – Preconstruction
37 Data Submittal.

38
39
40 **(A) Tax Clearance.** Pursuant to §103D-310(c), 103-53 and 103D-328,
41 the bidder shall submit a tax clearance certificate from the State of Hawaii
42 Department of Taxation (DOTAX) and the Internal Revenue Service (IRS),
43 subject to section 103D-328, HRS, current within six months of issuance
44 date.
45

FORM A6, TAX CLEARANCE CERTIFICATE, is available at the following website:

<https://tax.hawaii.gov/>

To receive DOTAX Forms by fax or mail, phone (808) 587-4242 or 1-800-222-3229.

The application for the Tax Clearance Certificate is the responsibility of the bidder. Bidder shall submit directly to the DOTAX or IRS. The approved certificate may then be submitted to the Department.

(B) DLIR Certificate of Compliance. Pursuant to §103D-310(c), HRS, the bidder shall submit a certificate of compliance for Hawaii Employment Security Law (Chapter 383, HRS), Workers' Compensation Law (Chapter 386, HRS), Temporary Disability Insurance (Chapter 392, HRS), and Prepaid Health Care Act (Chapter 393, HRS), from the State of Hawaii Department of Labor and Industrial Relations (DLIR), current within six months of issuance date.

FORM LIR#27, APPLICATION FOR CERTIFICATE OF COMPLIANCE WITH SECTION 3-122-112, HAR, is available at the following website:

<http://labor.hawaii.gov/>

Contact the DLIR Unemployment Insurance Division at (808) 586-8926 for additional information.

Inquiries regarding the status of a LIR#27 Form may be made by calling the DLIR Disability Compensation Division at (808) 586-9200.

The application for the Certificate of Compliance is the responsibility of the bidder. Bidder shall submit directly to the DLIR. The approved certificate may then be submitted to the Department.

(C) DCCA Certificate of Good Standing. Pursuant to §103D-310(c), HRS, the bidder shall submit a certificate of good standing from the business registration division (BREG) of the State of Hawaii Department of Commerce and Consumer Affairs (DCCA), current within six months of issuance date, to demonstrate that it is either:

(1) Incorporated or organized under the laws of the State; or

(2) Registered to do business in the State as a separate branch or division that is capable of fully performing under the contract.

A Hawaii business that is a sole proprietorship, is not required to register with the BREG, and therefore not required to submit a certificate of good standing. Bidders are advised of costs associated with registering and obtaining a Certificate of Good Standing from the DCCA.

To purchase a CERTIFICATE OF GOOD STANDING, go to On-Line Services at the following website:

<http://cca.hawaii.gov/>

The application for the Certificate of Good Standing is the responsibility of the bidder. Bidder shall submit directly to the DCCA. The approved certificate may then be submitted to the Department.

(D) Hawaii Compliance Express (HCE). In lieu of the certificates in subsection A, B, and C, the bidder may make available proof of compliance through a state procurement office designated certification process.

103.03 Cancellation of Award. The Department reserves the right to cancel the award of contracts before the execution of said contract by the parties. There will be no liability to the awardee and to other bidders.

103.04 Return of Proposal Guaranty. The Department will return the proposal guaranties, except those of the three lowest bidders, after the Department checks the proposals. The Department will return the proposal guaranties of the remaining two lowest bidders, not awarded the contract, within five working days following the execution of the contract. The Department will return the successful bidder's proposal guaranty after the successful bidder furnishes a bond and executes the contract.

103.05 Requirement of Contract Bond. At the time of execution of the contract, the successful bidder shall file a good and sufficient performance bond and a payment bond on the forms furnished by the Department conditioned for the full and faithful performance of the contract in accordance with the terms and intent thereof and for the prompt payment to all others for all labor and material furnished by them to the bidder and used in the prosecution of the work provided for in the contract. The bonds shall be of an amount equal to 100 percent of the amount of the contract price and include 5 percent of the contract amount estimated to be required for extra work. The bidder shall limit the acceptable performance and payment bonds to the following:

(a) Legal tender;

(b) Surety bond underwritten by a company licensed to issue bonds in the State of Hawaii; or

(c) A certificate of deposit; share certificate; cashier's check; treasurer's check, teller's check drawn by or a certified check accepted by and payable on demand to the State by a bank savings institution or credit union insured by the Federal Deposit Insurance Corporation (FDIC) or the National Credit Union Administration (NCUA).

1. The bidder may use these instruments only to a maximum of \$100,000.

2. If the required security or bond amount totals over \$100,000 more than one instrument not exceeding \$100,000 each and issued by different financial institutions shall be acceptable.

Such bonds shall also by the terms insure to the benefit of any and all persons entitled to file claims for labor done or material furnished in the work so as to give them a right of action as contemplated by HRS Section 103D-324.

103.06 Execution of the Contract. The contract bond and HRS Chapter 104 - Compliance Certificate, similar to a copy of the same annexed hereto, shall be executed by the successful bidder and returned within ten days after the award of the contract or within such further time as the Director may allow after the bidder has received the contract for execution.

The contract shall not bind the Department unless said parties execute the contract and the Director of Finance endorses the bidder's certificate in accordance with HRS Section 103-39.

103.07 Failure to Execute Contract. Failure to execute the contract and file acceptable bonds shall be cause for the cancellation of the award in accordance with Subsection 103.06 - Execution of the Contract. Also, the Contractor forfeits the proposal guaranty which becomes the property of the Department. This is not a penalty, but liquidated damages sustained by the State. The Department may then make award to the next lowest responsible and responsive bidder or the Department may readvertise and construct the work under contract."

END OF SECTION 103

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(I) Amend Section 104.11(B) Contractor's Duty to Locate and Protect Utility by adding the following after line 291:

(II) Amend **Section 104.06 Methods of Price Adjustment** as follows:

(1) By written agreement on a fixed price adjustment before commencement of the pertinent performance.

(3) The Engineer may base the adjustment for a lump sum item on a calculated proportionate unit price. The Engineer will calculate the proportionate unit price by dividing the original contract lump sum price by the actual or original estimated quantity established by the contract documents.

(5) At the sole option of the Engineer, work may be paid for on a force account basis in accordance with Subsection 109.06 - Force Account Provisions and Compensation.

(7) In the absence of agreement by the parties:

(A) For change orders with value not exceeding \$50,000 by documented actual costs of the work, allowing for overhead and profit as set forth in Section 109.05 - Allowances for Overhead and Profit. A change order shall be issued within fifteen days of

48 submission by the contractor of proper documentation of completed
49 force account work, whether periodic (conforming to the applicable
50 billing cycle) or final. The Engineer shall return any
51 documentation that is defective, to the contractor within fifteen days
52 after receipt, with a statement identifying the defect; or
53

54 **(B)** For change orders with value exceeding \$50,000 by a
55 unilateral determination by the Engineer of the costs attributable to
56 the events or situations with adjustment of profit and fee, all as
57 computed by the Engineer in accordance with applicable sections
58 of HAR Chapters 3-123 and 3-126, and Section 109.05 -
59 Allowances for Overhead and Profit. When a unilateral
60 determination has been made, a unilateral change order shall be
61 issued within ten days. Upon receipt of the unilateral change
62 order, if the contractor does not agree with any of the terms or
63 conditions, or the adjustment or nonadjustment of the contract time
64 or contract price, the contractor shall file a notice of intent to claim
65 within thirty days after the receipt of the written unilateral change
66 order. Failure to file a protest within the time specified shall
67 constitute agreement on the part of the contractor with the terms,
68 conditions, amounts, and adjustment or nonadjustment of the
69 contract time or the contract price set forth in the unilateral change
70 order.
71

72 A contractor shall be required to submit cost or pricing data if any
73 adjustment in contract price is subject to the provisions of HAR Chapter 3-122,
74 Subchapter 15. A fully executed change order or other document permitting
75 billing for the adjustment in price under any method listed in Subsections
76 104.06(1) through 104.06(7) shall be issued within ten days after agreement on
77 the method of adjustment."
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84 **END OF SECTION 104**

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(I) Amend **105.01 – Authority** to read as follows:

(A) Authority of the Engineer. The Engineer is the representative of the Director and has all the authority of the Director with respect to the contract. The Engineer will make decisions on all questions that may arise regarding the contract, such as, but not limited to:

- The Engineer may delegate specific authority to act for the Engineer to a specific person or persons. Such delegation of authority shall be established in writing and shall become effective upon delivery to the Contractor.

Failure of an Inspector at any time to reject non-conforming work shall not be considered a waiver of the State's right to require work in strict conformity with the contract documents as a condition of final acceptance.

47 **(C) Authority of the Consultant and Construction Management.**

48 The State may engage consultants and construction managements to
49 perform duties in connection with the work. Unless otherwise specified in
50 writing to the Contractor, such retained consultants and construction
51 managements shall have no greater authority than an Inspector.”

52
53 **(II) Amend Subsection 105.02 - Submittals** by revising the first paragraph
54 from lines 52 to 61 to read as follows:

55
56 **“105.02 Submittals.** The contract contains the description of various items
57 that the Contractor must submit to the Engineer for review and acceptance. The
58 Contractor shall review all submittals for correctness, conformance with the
59 requirements of the contract documents and completeness before submitting
60 them to the Engineer. The submittal shall indicate the contract items and
61 specifications subsections for which the submittal is provided. The submittal
62 shall be legible and clearly indicate what portion of the submittal is being
63 submitted for review. The Contractor shall provide six copies of the required
64 submissions at the earliest possible date.”

65
66 **(III) Amend Subsection 105.08 (A) - Furnishing Drawings and Special**
67 **Provisions** to read as follows:

68
69 **“(A) Furnishing Drawings and Special Provisions.** The State will
70 furnish the Contractor an electronic set of the special provisions and
71 plans.” The Contractor shall have and maintain at least one set of plans
72 and specifications on the work site, at all times.”

73
74 **(IV) Amend Subsection 105.14(D) – No Designated Storage Area** from lines
75 421 to 432 to read as follows:

76
77 **“(D) No Designated Storage Area.** If no storage area is designated
78 within the contract documents, materials and equipment may be stored
79 anywhere within the State highway right-of-way, provided such storage
80 and access to and from such site, within the sole discretion of the
81 Engineer, does not create a public or traffic hazard or an impediment to
82 the movement of traffic.”

83
84 **(V) Amend 105.16(A) – Subcontract Requirements** by adding the following
85 paragraph after line 483:

86
87 The 'Specialty Items' of work for this project are as follows:
88

89	Section	Description
90	No.	
91		
92	401	Contract Item No. 401.0100 under Section 401 – Hot Mix
93		Asphalt (HMA) Pavement
94		
95	629	All Contract Items under Section 629 - Pavement Markings
96		
97	631	All Contract Items under Section 631 - Traffic Control
98		Regulatory, Warning, and Miscellaneous Signs
99		
100	632	All Contract Items under Section 632 - Markers
101		
102	645	Contract Item No. 645.1000 under Section 645 – Work Zone
103		Traffic Control”
104		

(VI) Amend **Subsection 105.16(B) – Substituting Subcontractors** from line 487 to line 494 to read:

“(B) Substituting Subcontractors. Under HRS Chapter 103D-302, the Contractor is required to list the names of persons or firms to be engaged by the Contractor as a subcontractor or joint contractor in the performance of the contract. No subcontractor may be added or deleted, unless authorized by the Engineer. Substitutions will be allowed only if the subcontractor:

END OF SECTION 105

1 -Make the following amendment to said Section:

2
3 **SECTION 106 – MATERIAL RESTRICTIONS AND REQUIREMENTS**
4
5

6 **(I)** Amend **106.05(B) – Deviations** by revising the third sentence from line 106
7 to 108 to read as follows:

8
9 “Any deviations will be subject to Subsection 102.14 – Substitution of
10 Materials and Equipment Before Bid Opening.
11

12 **(II)** Replace **106.11 – Steel and Iron Construction Material** lines 238 through
13 277 with the following:

14
15 **106.11 Domestic Materials Procurement Preference.** Federal-aid contracts
16 are subject to the Domestic Materials Procurement Preference, as established by
17 the Buy America Act (1978 Surface Transportation Assistance Act) and the Build
18 America, Buy America (BABA) Act (2021 Infrastructure Investment and Jobs Act).
19 This requirement applies to the following categories of products and materials that
20 are permanently incorporated into the project.
21

22 **(1)** Iron or Steel Products, 23 CFR § 635.410 (Buy America).
23

24 **(2)** Construction Materials, 2 CFR Part 184 (BABA).
25

26 **(3)** Manufactured Products, 23 CFR § 635.410 (Buy America).
27

28 **(4)** Other materials, including BABA Section 70917(c) materials.
29

30 An article, material, or supply should not be considered to fall into multiple
31 categories, except for precast concrete products and ITS and electronic hardware
32 system cabinets and enclosures which are designated as falling into 2 categories:
33 Manufactured Products and Steel or Iron in accordance with 23CFR
34 635.410(c)(2)(i) and (ii) and 106.11(C). The classification of an article, material, or
35 supply into the categories must be based on its status at the time it is brought to
36 the work site for incorporation into an infrastructure project. In general, the work
37 site is the location of the infrastructure project at which the iron, steel,
38 manufactured products, and construction materials will be incorporated.
39

40 **(A) Iron and Steel Products.** For Federal-aid projects, steel and iron
41 products permanently incorporated into the project shall be melted and
42 manufactured in the United States in accordance with 23 CFR § 635.410
43 Buy America Requirements.
44

Steel or iron products means articles, materials, or supplies that consist wholly or predominantly of iron or steel or a combination of both and the cost of the iron and steel content exceeds 50 percent of the total cost of all its components. The cost of iron and steel is the cost of the iron or steel mill products (such as bar, billet, slab, wire, plate, or sheet), castings, or forgings utilized in the manufacture of the product, and a good faith estimate of the cost of iron or steel components.

Manufacturing includes any process that modifies the chemical content, physical shape or size, or final finish of a product. The manufacturing process begins with initial melting and mixing and continues through fabrication (cutting, drilling, welding, bending, etc.) and coating. Coating includes epoxy coating, galvanizing, aluminizing, painting, and any other coating that protects or enhances the value of steel or iron.

(B) Construction Materials. Construction materials mean articles, materials, or supplies that consist of only one of the items listed below, except as provided in Subsection 106.11(C) – Manufactured Products subparagraphs (1) and (2). All manufacturing processes, as defined in 2 CFR § 184.6 for these construction materials, must occur in the United States.

- (1) Non-ferrous metals.
- (2) Plastic and polymer-based products such as:
 - (a) Polyvinylchloride.
 - (b) Composite building materials.
 - (c) Polymers used in fiber optic cables.
- (3) Glass (including optic glass).
- (4) Fiber optic cable (including drop cable).
- (5) Optical fiber.
- (6) Lumber.
- (7) Engineered wood.
- (8) Drywall.

BABA Section 70917(c) materials, as defined in 2 CFR § 184.3, do not require domestic sourcing or domestic material certification. BABA Section 70917(c) materials means:

- (1) Cement and cementitious materials.
- (2) Aggregates such as stone, sand, or gravel.
- (3) Aggregate binding agents or additives.

(C) Manufactured Products. Buy America requirements apply to manufactured products. Manufactured products are defined as articles, materials, or supplies that have been processed into a specific form and shape or combined with other articles, materials, or supplies to create a product with different properties than the individual articles, materials, or supplies. For Federal-aid projects, all manufactured products must be produced in the United States.

For projects let on or after October 1, 2025, manufactured products shall be manufactured, including final assembly, in the United States.

For projects let on or after October 1, 2026, manufactured products shall be manufactured, including final assembly, in the United States. The cost of the components of the manufactured product that are mined, produced, or manufactured in the United States shall be greater than 55 percent of the total cost of all components of the manufactured product.

(1) **Precast Concrete** – Precast Concrete products that are classified as manufactured products, components of precast concrete products that consist wholly or predominantly of iron or steel or a combination of both, shall also meet the requirements of Subsection 106.11(A) – Iron and Steel Products.

(2) **Intelligent Transportation and Electronic Hardware Systems** – Intelligent transportation systems and other electronic hardware systems that are installed in the highway right of way or other real property and classified as manufactured products. The cabinets or other enclosures of such systems that consist wholly or predominantly of iron or steel or a combination of both shall also meet the requirements of Subsection 106.11(A) – Iron and Steel Products.

131 **(D) Contractor Domestic Materials Preference (DMP) Form.** The
132 Prime Contractor shall provide a Contractor Domestic Materials Preference
133 Form using the E-Construction platform. A DMP form must be submitted for
134 iron, steel, construction materials, and manufactured products delivered to
135 the project and permanently incorporated into the work. The Prime
136 Contractor shall provide supporting documentation to assure the article,
137 material, or supply meets the Domestic Materials Procurement Preference
138 requirements as established in the Buy America Act (1978 Surface
139 Transportation Assistance Act) and the Build America, Buy America (BABA)
140 Act (2021 Infrastructure Investment and Jobs Act).

141
142
143

END OF SECTION 106

1 **SECTION 107 - LEGAL RELATIONS AND RESPONSIBILITY TO PUBLIC**

2
3 Make the following amendments to said Section:

4
5 **(I)** Amend **Section 107.01 Insurance Requirements** from lines 5 to 81 to
6 read as follows:

7
8 **“(A) Obligation of Contractor.** Contractor shall not commence any
9 work until it obtains, at its own expense, all required insurance described
10 herein. Such insurance shall be provided by an insurance company
11 authorized by the laws of the State to issue such insurance in the State of
12 Hawaii. Coverage by a “Non-Admitted” carrier is permissible provided the
13 carrier has a Best’s Rating of “A-VII” or better. The Contractor shall
14 maintain and ensure all insurance policies are current for the full period of
15 the contract until final acceptance of the work by the State.
16

17 The Certificate of Insurance shall contain: a clause that it is agreed
18 that any insurance maintained by the State of Hawaii will apply in excess
19 of, and not contribute with, insurance provided by this policy; and shall be
20 accompanied by endorsement form CG2010 or equivalent naming the
21 State as an additional insured to the policy which status shall be
22 maintained for the full period of the contract until final acceptance of the
23 work by State.
24

25 The Contractor shall obtain all required insurance as part of the
26 contract price. Where there is a requirement for the State of Hawaii and
27 its officers and employees to be named as additional insureds under any
28 Contractor’s insurance policy, before the State of Hawaii issues the Notice
29 to Proceed, the Contractor shall obtain and submit to the Engineer a
30 Certificate of Insurance and a written policy endorsement that confirms the
31 State of Hawaii and its officers and employees are additional insureds for
32 the specific State project number and project title under such insurance
33 policies. The written policy endorsement must be issued by the insurance
34 company insuring the Contractor for the specified policy type or by an
35 agent of such insurance company who is vested with the authority to issue
36 a written policy endorsement. The insurer’s agent shall also submit
37 written confirmation of such authority to bind the insurer. Any delays in
38 the issuance of the Notice to Proceed attributed to the failure to obtain the
39 proof of the State of Hawaii and its officers and employees’ additional
40 insured status shall be charged to the Contractor.
41

42 A mere Certificate of Insurance issued by a broker who represents
43 the Contractor (but not the Contractor’s insurer), or by any other party who
44 is not authorized to contractually name the State as an additional insured
45 under the Contractor’s insurance policy, is not sufficient to meet the
46 Contractor’s insurance obligations.

47
48 Certificates shall contain a provision that coverages being certified
49 will not be cancelled or materially changed without giving the Engineer at
50 least thirty (30) days prior written notice. Contractor will immediately
51 provide written notice to the Director should any of the insurance policies
52 evidenced on its Certificate of Insurance form be cancelled, reduced in
53 scope or coverage, or not renewed upon expiration. Should any policy be
54 canceled before final acceptance of the work by the State, and the
55 Contractor fails to immediately procure replacement insurance as
56 specified, the State, in addition to all other remedies it may have for such
57 breach, reserves the right to procure such insurance and deduct the cost
58 thereof from any money due or to become due to the Contractor.
59

60 Nothing contained in these insurance requirements is to be
61 construed as limiting the extent of Contractor's responsibility for payment
62 of damages resulting from its operations under this contract, including the
63 Contractor's obligation to pay liquidated damages, nor shall it affect the
64 Contractor's separate and independent duty to defend, indemnify and hold
65 the State harmless pursuant to other provisions of this contract. In no
66 instance will the State's exercise of an option to occupy and use
67 completed portions of the work relieve the Contractor of its obligation to
68 maintain the required insurance until the date of final acceptance of the
69 work.
70

71 All insurance described herein shall be primary and cover the
72 insured for all work to be performed under the contract, all work performed
73 incidental thereto or directly or indirectly connected therewith, including
74 but not limited to traffic detour work, barricades, warnings, diversions, lane
75 closures, and other work performed outside the work area and all change
76 order work.
77

78 The Contractor shall, from time to time, furnish the Engineer, when
79 requested, satisfactory proof of coverage of each type of insurance
80 required covering the work. Failure to comply with the Engineer's request
81 may result in suspension of the work, and shall be sufficient grounds to
82 withhold future payments due the Contractor and to terminate the contract
83 for Contractor's default.
84

85 **(B) Types of Insurance.** Contractor shall purchase and maintain
86 insurance described below which shall provide coverage against claims
87 arising out of the Contractor's operations under the contract, whether such
88 operations be by the Contractor itself or by any subcontractor or by
89 anyone directly or indirectly employed by any of them or by anyone for
90 whose acts any of them may be liable.
91

92 **(1) Workers' Compensation.** The Contractor shall obtain
93 worker's compensation insurance for all persons whom they
94 employ in carrying out the work under this contract. This insurance
95 shall be in strict conformity with the requirements of the most
96 current and applicable State of Hawaii Worker's Compensation
97 Insurance laws in effect on the date of the execution of this contract
98 and as modified during the duration of the contract.
99

100 **(2) Auto Liability.** The Contractor shall obtain Auto Liability
101 Insurance covering all owned, non-owned and hired autos with a
102 Combined single Limit of not less than \$1,000,000 per occurrence
103 for bodily injury and property damage with the State of Hawaii
104 named as additional insured. Refer to SPECIAL CONDITIONS for
105 any additional requirements.
106

107 **(3) General Liability.** The Contractor shall obtain General
108 Liability insurance with a limit of not less than \$2,000,000 per
109 occurrence and in the Aggregates for each of the following:
110

- 111 **(a)** Products - Completed/Operations Aggregate,
- 112
- 113 **(b)** Personal & Advertising Injury, and
- 114
- 115 **(c)** Bodily Injury & Property Damage
116

117 The General Liability insurance shall include the State as an
118 Additional Insured. The required limit of insurance may be provided
119 by a single policy or with a combination of primary and excess
120 policies. Refer to SPECIAL CONDITIONS for any additional
121 requirements.
122

123 **(4) Builders Risk For All Work.** The Contractor shall take out
124 a policy of builder's risk insurance for the full replacement value of
125 the project work; from a company licensed or otherwise authorized
126 to do business in the State of Hawaii; naming the State as an
127 additional insured under each policy; and covering all work, labor,
128 and materials furnished by such Contractor and all its
129 subcontractors against loss by fire, windstorm, tsunamis,
130 earthquakes, lightning, explosion, other perils covered by the
131 standard Extended Coverage Endorsement, vandalism, and
132 malicious mischief. Refer to SPECIAL CONDITIONS for any
133 additional requirements."
134
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END OF SECTION 107

1 Amend **Section 108 – PROSECUTION AND PROGRESS** to read as follows:

2
3 **“SECTION 108 – PROSECUTION AND PROGRESS**

4
5
6 **108.01 Notice to Proceed (NTP).** A Notice To Proceed will be issued to the
7 Contractor not more 30 calendar days after the contract certification date. The
8 Engineer may suspend the contract before issuing the Notice To Proceed, in
9 which case the Contractor’s remedies are exclusively those set forth in Subsection
10 108.10 – Suspension of Work.

11
12 The Contractor shall be allowed up to 14 calendar days after the Notice to
13 Proceed to begin physical work. The Start Work Date will be established when
14 this period ends or on the actual day that physical work begins, whichever is first.
15 Charging of Contract Time will begin on the Start Work Date. The Contractor shall
16 notify the Engineer, in writing, at least five working days before beginning physical
17 work.

18
19 In the event that the Contractor fails to start physical work within the time
20 specified, the Engineer may terminate the contract in accordance with Subsection
21 108.11 – Termination of Contract for Cause.

22
23 During the period between the Notice to Proceed and the Start Work Date
24 the Contractor should adjust work forces, equipment, schedules, and procure
25 materials and required permits, prior to beginning physical work.

26
27 Any physical work done prior to the Start Work Date will be considered
28 unauthorized work. If the Engineer does not direct that the unauthorized work be
29 removed, it shall be paid for after the Start Work Date and only if it is acceptable.

30
31 In the event that the Engineer establishes, in writing, a Start Work Date that
32 is beyond 60 calendar days from the Notice to Proceed date, the Contractor may
33 submit a claim in accordance with, Subsection 107.15 – Disputes and Claims for
34 increased labor and material costs which are directly attributable to the delay
35 beyond the first 60 calendar days after the Notice to Proceed date.

36
37 The Contractor shall notify the Engineer at least 24 hours before restarting
38 physical work after a suspension of work pursuant to Subsection 108.10 –
39 Suspension of Work.

40
41 Once physical work has begun, the Contractor shall work expeditiously and
42 pursue the work diligently to completion with the contract time. If a portion of the
43 work is to be done in stages, the Contractor shall leave the area safe and usable
44 for the user agency and the public at the end of each stage.

108.03

108.02 Prosecution of Work. Unless otherwise permitted by the Engineer, in writing, the Contractor shall not commence with physical construction unless sufficient materials and equipment are available for either continuous construction or completion of a specified portion of the work.

108.03 Preconstruction Submittals. The awardee shall submit to the Engineer for information and review the pre-construction submittals within 21 calendar days from award. Until the items listed below are received and found acceptable by the Engineer, the Contractor shall not start physical work unless otherwise authorized to do so in writing and subject to such conditions set by the Engineer. Charging of Contract Time will not be delayed, and additional contract time will not be granted due to Contractor delay in submitting acceptable preconstruction submittals. No progress payment will be made to the Contractor until the Engineer acknowledges, in writing, receipt of the following preconstruction submittals acceptable to the Engineer:

- (1) List of the Superintendent and other Supervisory Personnel, and their contact information.
- (2) Name of person(s) authorized to sign for the Contractor.
- (3) Work Schedule including hours of operation.
- (4) Initial Progress Schedule (See Subsection 108.06 – Progress Schedule).
- (5) Water Pollution and Siltation Control Submittals, including Site-Specific Best Management Practice Plan.
- (6) Solid Waste Disposal form.
- (7) Tax Rates.
- (8) Insurance Rates.
- (9) Certificate of Insurance, satisfactory to the Engineer, indicating that the Contractor has in place all insurance coverage required by the contract documents.
- (10) Schedule of agreed prices.
- (11) List of suppliers.
- (12) Traffic Control Plan, if applicable.

108.04 Character and Proficiency of Workers. The Contractor shall at all times provide adequate supervision and sufficient labor and equipment for prosecuting the work to full completion in the manner and within the time required by the contract. The superintendent and all other representatives of the Contractor shall act in a civil and honest manner in all dealings with the Engineer, all other State officials and representatives, and the public, in connection with the work.

All workers shall possess the proper license, certification, job classification, skill, training, and experience necessary to properly perform the work assigned to them.

The Engineer may direct the removal of any worker(s) who does not carry out the assigned work in a proper and skillful manner or who is disrespectful, intemperate, violent, or disorderly. The worker shall be removed forthwith by the Contractor and will not work again without the written permission of the Engineer.

108.05 Contract Time.

(A) Calculation of Contract Time. When the contract time is on a working day basis, the total contract time allowed for the performance of the work will be the number of working days shown in the contract plus any additional working days authorized in writing as provided hereinafter. The count of elapsed working days to be charged against contract time, will begin from the Start Work Date and will continue consecutively to the date of Substantial Completion. When multiple shifts are used to perform the work, the State will not consider the hours worked over the normal eight working hours per day or night as an additional working day.

When the contract is on a calendar day basis, the total contract time allowed for the performance of the work will be the number of days shown in the contract plus any additional days authorized in writing as provided hereinafter. The count of elapsed days to be charged against contract time will begin from the Start Work Date and will continue consecutively to the date of Substantial Completion. The Engineer will exclude days elapsing between the orders of the Engineer to suspend work and resume work for suspensions not the fault of the Contractor.

(B) Modifications of Contract Time. Whenever the Contractor believes that an extension of contract time is justified, the Contractor shall serve written notice on the Engineer not more than five working days after the occurrence of the event that causes a delay or justifies a contract time extension. Contract time may be adjusted for the following reasons or events, but only if and to the extent the critical path has been affected:

(1) **Changes in the Work, Additional Work, and Delays Caused by the State.** If the Contractor believes that an extension of time is justified on account of any act or omission by the State, and is not adequately provided for in a field order or change order, it must request the additional time as provided above. At the request of the Engineer, the Contractor must show how the critical path will be affected and must also support the time extension request with schedules, as well as statements from its subcontractors, suppliers, or manufacturers, as necessary. Claims for compensation for any altered or additional work will be determined pursuant to Subsection 104.02 – Changes.

Additional time to perform the extra work will be added to the time allowed in the contract without regard to the date the change directive was issued, even if the contract completion date has passed. A change requiring time issued after contract time has expired will not constitute an excusal or waiver of pre-existing Contractor delay.

(2) **Delay for Permits.** For delays in the routine application and processing time required to obtain necessary permits, including permits to be obtained from State agencies, the Engineer may grant an extension provided that the permit takes longer than 30 days to acquire and the delay is not caused by the Contractor, and provided that as soon as the delay occurs, the Contractor notifies the Engineer in writing that the permits are not available. Permits required by the contract that take less than 30 days to acquire from the time which the appropriate documents are granted shall be acquired between Notice to Proceed and Start Work Date or accounted for in the contractor's progress schedule. Time extensions will be the exclusive relief granted on account of such delays.

(3) **Delays Beyond Contractor's Control.** For delays caused by acts of God, a public enemy, fire, inclement weather days or adverse conditions resulting therefrom, earthquakes, floods, epidemics, quarantine restrictions, labor disputes impacting the Contractor or the State, freight embargoes and other reasons beyond the Contractor's control, the Contractor may be granted an extension of time provided that:

(a) In the written notice of delay to the Engineer, the Contractor describes possible effects on the completion date of the contract. The description of delays shall:

180 1. State specifically the reason or reasons for the
181 delay and fully explain in a detailed chronology how the
182 delay affects the critical path.

183
184 2. Include copies of pertinent documentation to
185 support the time extension request.

186
187 3. Cite the anticipated period of delay and the time
188 extension requested.

189
190 4. State either that the above circumstances have
191 been cleared and normal working conditions restored
192 as of a certain day or that the above circumstances will
193 continue to prevent completion of the project.

194
195 (b) The Contractor shall notify the Engineer in writing when
196 the delay ends. Time extensions will be the exclusive relief
197 granted and no additional compensation will be paid the
198 Contractor for such delays.

199
200 **(4) Delays in Delivery of Materials or Equipment.** For delays
201 in delivery of materials or equipment, which occur as a result of
202 unforeseeable causes beyond the control and without fault of the
203 Contractor, its subcontractor(s) or supplier(s), time extensions shall
204 be the exclusive relief granted and no additional compensation will
205 be paid the Contractor on account of such delay. The delay shall not
206 exceed the difference between the originally scheduled delivery date
207 and the actual delivery date. The Contractor may be granted an
208 extension of time provided that it complies with the following
209 procedures:

210
211 (a) The Contractor's written notice to the Engineer must
212 describe the delays and state the effect such delays may have
213 on the critical path.

214
215 (b) The Contractor, if requested, must submit to the
216 Engineer within five days after a firm delivery date for the
217 material and equipment is established, a written statement
218 regarding the delay. The Contractor must justify the delay as
219 follows:

220
221 1. State specifically all reasons for the delay.
222 Explain in a detailed chronology the effect of the delay
223 on the critical path.

2. Submit copies of purchase order(s), factory invoice(s), bill(s) of lading, shipping manifest(s), delivery tag(s), and any other documents to support the time extension request.

3. Cite the start and end date of the delay and the time extension requested.

(5) Delays for Suspension of Work. When the performance of the work is totally suspended for one or more days (calendar or working days, as appropriate) by order of the Engineer in accordance with Subsections 108.10(A)(1), 108.10(A)(2), or 108.10(A)(5) the number of days from the effective date of the Engineer's order to suspend operations to the effective date of the Engineer's order to resume operations shall not be counted as contract time and the contract completion date will be adjusted. During periods of partial suspensions of the work, the Contractor will be granted a time extension only if the partial suspension affects the critical path. If the Contractor believes that an extension of time is justified for a partial suspension of work, it must request the extension in writing at least five working days before the partial suspension will affect the critical operation(s) in progress. The Contractor must show how the critical path was increased based on the status of the work and must also support its claim if requested, with statements from its subcontractors. A suspension of work will not constitute a waiver of pre-existing Contractor delay.

(6) Contractor Caused Delays. No time extension will be granted under the following circumstances:

(a) Delays within the Contractor's control in performing the work caused by the Contractor, subcontractor, supplier, or any combination thereof.

(b) Delays within the Contractor's control in arrival of materials and equipment caused by the Contractor, subcontractor, supplier, or any combination thereof, in ordering, fabricating, and delivery.

(c) Delays requested for changes which do not affect the critical path.

(d) Delays caused by the failure of the Contractor to make submittals in a timely manner for review and acceptance by the Engineer, such as but not limited to shop drawings, descriptive sheets, material samples, and color samples except as covered in Subsection 108.05(B)(3) – Delays Beyond Contractor’s Control and 108.05(B)(4) – Delays in Delivery of Materials or Equipment.

(e) Delays caused by the failure to submit sufficient information and data in a timely manner in the proper form in order to obtain necessary permits related to the work.

(f) Failure to follow the procedure within the time allowed by contract to request a time extension.

(g) Failure of the Contractor to provide evidence sufficient to support the time extension request.

(7) Reduction in Time. If the State deletes or modifies any portion of the work, an appropriate reduction of contract time may be made in accordance with Subsection 104.02 - Changes.

108.06 Progress Schedules.

(A) Forms of Schedule. All schedules shall be submitted using the specific computer program designated in the bid documents. If no such scheduling software program is designated, then all schedules shall be submitted using the latest version of Microsoft Project by Microsoft or approved equivalent software program.

Schedule submittals shall be as follows:

(1) For Contracts \$2,000,000 or less or For Contract Time 100 Working Days or 140 Calendar Days or Less. For contracts of \$2,000,000 or less or for contract time of 100 working days or 140 calendar days or less, the progress schedule will be a Time Scaled Logic Diagram (TSLD). The Contractor shall submit a TSLD submittal package meeting the following requirements and having these essential and distinctive elements:

(a) The major features of work, such as but not limited to BMP installation, grubbing, roadway excavation, structure excavation, structure construction, shown in the chronological order in which the Contractor proposes to work that feature or work and its location on the project. The schedule shall account for normal inclement weather, unusual soil or other

conditions that may influence the progress of the work, schedules, and coordination required by any utility, off or on site fabrications, and other pertinent factors that relate to progress;

(b) All features listed or not listed in the contract documents that the Contractor considers a controlling factor for the timely completion of the contract work.

(c) The time span and sequence of the activities or events for each feature, and its interrelationship and interdependencies in time and logic to other features in order to complete the project.

(d) The total anticipated time necessary to complete work required by the contract.

(e) A chronological listing of critical intermediate dates or time periods for features or milestones or phases that can affect timely completion of the project.

(f) Major activities related to the location on the project.

(g) Non-construction activities, such as submittal and acceptance periods for shop drawings and material, procurement, testing, fabrication, mobilization, and demobilization or order dates of long lead material.

(h) Set schedule logic for out of sequence activities to retain logic. In addition, open ends shall be non-critical.

(i) Show target bars for all activities.

(j) Vertical and horizontal sight lines both major and minor shall be used as well as a separator line between groups. The Engineer will determine frequency and style.

(k) The file name, print date, revision number, data and project title and number shall be included in the title block.

(l) Have columns with the appropriate data in them for activity ID, description, original duration, remaining duration, early start, early finish, total float, percent complete, resources. The resource column shall list who is responsible for the work to be done in the activity. These columns shall be to the left of the bar chart.

(2) **For Contracts Which Have A Contract Amount More Than \$2,000,000 Or Having A Contract Time Of More Than 100 Working Days Or 140 Calendar Days.** For contracts which have a contract amount more than \$2,000,000 or contract time of more than 100 working days or 140 calendar days, the Contractor shall submit a Timed-Scaled Logic Diagram (TSLD) meeting the following requirements and having these essential and distinctive elements:

(a) The information and requirements listed in Subsection 108.06(A)(1) – For Contracts \$2,000,000 or Less or For Contract Time 100 Working Days or 140 Calendar Days or Less.

(b) Additional reports and graphics available from the software as requested by the Engineer.

(c) Sufficient detail to allow at least weekly monitoring of the Contractor and subcontractor's operations.

(d) The time scaled schematic shall be on a calendar or working days basis. What will be used shall be determined by how the contract keeps track of time. It will be the same. Plot the critical calendar dates anticipated.

(e) Breakdown of activity, such as forming, placing reinforcing steel, concrete pouring and curing, and stripping in concrete construction. Indicate location of work to be done in such detail that it would be easily determined where work would be occurring within approximately 200 feet.

(f) Latest start and finish dates for critical path activities.

(g) Identify responsible subcontractor, supplier, and others for their respective activity.

(h) No individual activity shall have duration of more than 20 calendar days unless requested and approved by the Engineer.

(i) All activities shall have work breakdown structure codes and activity codes. The activity codes shall have coding that incorporates information for phase, location, who is responsible for doing work and type of operation and activity description.

(j) Incorporate all physical access and availability restraints.

(B) Inspection and Testing. All schedules shall provide reasonable time and opportunity for the Engineer to inspect and test each work activity.

(C) Engineer's Acceptance of Progress Schedule. The submittal of, and the Engineer's receipt of any progress schedule, shall not be deemed an agreement to modify any terms or conditions of the contract. Any modifications to the contract terms and conditions that appear in or may be inferred from an acceptable schedule will not be valid or enforceable unless and until the Engineer exercises discretion to issue an appropriate change order. Nor shall any submittal or receipt imply the Engineer's approval of the schedule's breakdown, its individual elements, any critical path that may be shown, nor shall it obligate the State to make its personnel available outside normal working hours or the working hours established by the Contract in order to accommodate such schedule. The Contractor has the risk of all elements (whether or not shown) of the schedule and its execution. No claim for additional compensation, time, or both, shall be made by the Contractor or recognized by the Engineer for delays during any period for which an acceptable progress schedule or an updated progress schedule as required by Subsection 108.06(E) – Contractor's Continuing Schedule Submittal Requirements had not been submitted. Any acceptance or approval of the schedule shall be for general format only and shall not be deemed an agreement by the State that the construction means, methods, and resources shown on the schedule will result in work that conforms to the contract requirements or that the sequences or durations indicated are feasible.

(D) Initial Progress Schedule. The Contractor shall submit an initial progress schedule. The initial progress schedule shall consist of the following:

- (1) Four sets of the TSLD schedule.
- (2) All the software files and data to re-create the TSLD in a computerized software format as specified by the Engineer.
- (3) A listing of equipment that is anticipated to be used on the project. Including the type, size, make, year of manufacture, and all information necessary to identify the equipment in the Rental Rate Blue Book for Construction Equipment.
- (4) An anticipated manpower requirement graph plotting contract time and total manpower requirement. This may be superimposed over the payment graph.

(5) A Method Statement that is a detailed narrative describing the work to be done and the method by which the work shall be accomplished for each major activity. A major activity is an activity that:

- (a) Has a duration longer than five days.
- (b) Is a milestone activity.
- (c) Is a contract item that exceeds \$10,000 on the contract cost proposal.
- (d) Is a critical path activity.
- (e) Is an activity designated as such by the Engineer.

Each Method Statement shall include the following items needed to fulfill the schedule:

- (a) Quantity, type, make, and model of equipment.
- (b) The manpower to do the work, specifying worker classification.
- (c) The production rate per eight hour day, or the working hours established by the contract documents needed to meet the time indicated on the schedule. If the production rate is not for eight hours, the number of working hours shall be indicated.

(6) Two sets of color time-scaled project evaluation and review technique charts ("PERT") using the activity box template of Logic – Early Start or such other template designated by the Engineer.

If the contract documents establish a sequence or order for the work, the initial progress schedule shall conform to such sequence or order.

(E) Contractor's Continuing Schedule Submittal Requirements.

After the acceptance of the initial TSLD and when construction starts, the Contractor shall submit four plotted progress schedules, two PERT charts, and reports on all construction activities every two weeks (bi-weekly). This scheduled bi-weekly submittal shall also include an updated version of the project schedule in a computerized software format as specified by the Engineer. The submittal shall have all the information needed to re-create that time period's TSLD plot and reports. The bi-weekly submittal shall include, but not limited to, an update of activities based on actual durations,

all new activities and any changes in duration or start or finish dates of any activity.

The Contractor shall submit with every update, in report form acceptable to the Engineer, a list of changes to the progress schedule since the previous schedule submittal. The Engineer may change the frequency of the submittal requirements but may not require a submittal of the schedule to be more than once a week. The Engineer may decrease the frequency of the submittal of the bi-weekly schedule.

The Contractor shall submit updates of the anticipated work completion graph, equipment listing, manpower requirement graph or method statement when requested by the Engineer. The Contractor shall submit such updates within 4 calendar days from the date of the request by the Engineer.

The Engineer may withhold progress payment until the Contractor is in compliance with all schedule update requirements

(F) Float. All float appearing on a schedule is a shared commodity. Float does not belong to or exist for the exclusive use or benefit of either the State or the Contractor. The State or the Contractor has the opportunity to use available float until it is depleted. Float has no monetary value.

(G) Scheduled Meetings. The Contractor shall meet on a bi-weekly basis with the Engineer to review the progress schedule. The Contractor shall have someone attending the meeting that can answer all questions on the TSLD and other schedule related submittals.

(H) Accelerated Schedule; Early Completion. If the Contractor submits an accelerated schedule (shorter than the contract time), the Engineer's review and acceptance of an accelerated schedule does not constitute an agreement or obligation by the State to modify the contract time or completion date. The Contractor is solely responsible for and shall accept all risks and any delays, other than those that can be directly and solely attributable to the State, that may occur during the work, until the contract completion date. The contract time or completion date is established for the benefit of the State and cannot be changed without an appropriate change order or Substantial Completion granted by the State. The State may accept the work before the completion date is established, but is not obligated to do so.

If the TSLD indicates an early completion of the project, the Contractor shall, upon submittal of the schedule, cooperate with the Engineer in explaining how it will be achieved. In addition, the Contractor shall submit the above explanation in writing which shall include the State's part, if any, in achieving the early completion date. Early completion of the project shall not rely on changes to the Contract Documents unless approved by the Engineer.

(l) Contractor Responsibilities. The Contractor shall promptly respond to any inquiries from the Engineer regarding any schedule submission. The Contractor shall adjust the schedule to address directives from the Engineer and shall resubmit the TSLD package to the Engineer until the Engineer finds it acceptable.

The Contractor shall perform the work in accordance with the submitted TSLD. The Engineer may require the Contractor to provide additional work forces and equipment to bring the progress of the work into conformance with the TSLD at no increase in contract price or contract time whenever the Engineer determines that the progress of the work does not insure completion within the specified contract time.

108.07 Weekly Meeting. In addition to the bi-weekly schedule meetings, the Contractor shall be available to meet once a week with the Engineer at the time and place as determined by the Engineer to discuss the work and its progress including but not limited to, the progress of the project, potential problems, coordination of work, submittals, erosion control reports, etc. The Contractor's personnel attending shall have the authority to make decisions and answer questions.

The Contractor shall bring to weekly meetings a detailed work schedule showing the next three weeks' work. Number of copies of the detailed work schedule to be submitted will be determined by the Engineer. The three-week schedule is in addition to the TSLD and shall in no way be considered as a substitute for the TSLD or vice versa. The three-week schedule shall show:

(a) All construction events, traffic control and BMP related activities in such detail that the Engineer will be able to determine at what location and type of work will be done for any day for the next three weeks. This is for the State to use to plan its manpower requirements for that time period.

(b) The duration of all events and delays.

(c) The critical path clearly marked in red or marked in a manner that makes it clearly distinguishable from other paths and is acceptable to the Engineer.

(d) Critical submittals and requests for information (RFI's).

(e) The project title, project number, date created, period the schedule covers, Contractor's name and creator of the schedule on each page.

Two days prior to each weekly meeting, the Contractor shall submit a list of outstanding submittals, RFIs and issues that require discussion.

108.08 Liquidated Damages for Failure to Complete the Work or Portions of the Work on Time. The actual amount of damages resulting from the Contractor's failure to complete the contract in a timely manner is difficult to accurately determine. Therefore, the amount of such damages shall be liquidated damages as set forth herein and in the special provisions. The State may, at its discretion, deduct the amount from monies due or that may become due under the contract.

When the Contractor fails to reach substantial completion of the work for which liquidated damages are specified, within the time or times fixed in the contract or any extension thereof, in addition to all other remedies for breach that may be available to the State, the Contractor shall pay liquidated damages to the State, in the amount of \$5,000 per working day.

(A) Liquidated Damages Upon Termination. If the State terminates on account of Contractor's default, liquidated damages may be charged against the defaulting Contractor and its surety until final completion of work.

(B) Liquidated Damages for Failure to Complete the Punchlist. The Contractor shall complete the work on any punchlist created after the pre-final inspection, within the contract time or any extension thereof.

When the Contractor fails to complete the work on such punchlist within the contract time or any extension thereof, the Contractor shall pay liquidated damages to the State of 20 percent of the amount of liquidated damages established for failure to substantially complete the work within contract time. Liquidated damages shall not be assessed for the period between:

(1) Notice from the Contractor that the project is substantially complete and the time the punchlist is delivered to the Contractor.

(2) The date of the completion of punchlist as determined by the Engineer and the date of the successful final inspection, and

(3) The date of the Final Inspection that results in Substantial Completion and the receipt by the Contractor of the written notice of Substantial Completion.

(C) Actual Damages Recoverable If Liquidated Damages Deemed Unenforceable. In the event a court of competent jurisdiction holds that any liquidated damages assessed pursuant to this contract are unenforceable, the State will be entitled to recover its actual damages for Contractor's failure to complete the work, or any designated portion of the work within the time set by the contract.

108.09 Rental Fees for Unauthorized Lane Closure or Occupancy. In addition to all other remedies available to the State for Contractor's breach of the terms of the contract, the Engineer will assess the rental fees in the amount of \$500 for every one-to fifteen-minute increment for each roadway lane closed to public use or occupied beyond the time periods authorized in the contract or by the Engineer. The maximum amount assessed per day shall be \$5,000. The State may, at its discretion, deduct the amount from monies due or that may become due under the contract. The rental fee may be waived in whole or part if the Engineer determines that the unauthorized period of lane closure or occupancy was due to factors beyond the control of the Contractor. Equipment breakdown is not a cause to waive liquidated damages.

108.10 Suspension of Work.

(A) Suspension of Work. The Engineer may, by written order, suspend the performance of the work, either in whole or in part, for such periods as the Engineer may deem necessary, for any cause, including but not limited to:

(1) Weather or soil conditions considered unsuitable for prosecution of the work.

(2) Whenever a redesign that may affect the work is deemed necessary by the Engineer.

(3) Unacceptable noise or dust arising from the construction even if it does not violate any law or regulation.

(4) Failure on the part of the Contractor to:

(a) Correct conditions unsafe for the general public or for the workers.

(b) Carry out orders given by the Engineer.

(c) Perform the work in strict compliance with the provisions of the contract.

(d) Provide adequate supervision on the jobsite.

(5) The convenience of the State.

(B) Partial and Total Suspension. Suspension of work on some but not all items of work shall be considered a "partial suspension". Suspension of work on all items shall be considered "total suspension". The period of suspension shall be computed from the date set out in the written order for work to cease until the date of the order for work to resume.

(C) Reimbursement to Contractor. In the event that the Contractor is ordered by the Engineer in writing as provided herein to suspend all work under the contract for the reasons specified in Subsections 108.10(A)(2), 108.10(A)(3), or 108.10(A)(5) of the "Suspension of Work" paragraph, the Contractor may be reimbursed for actual direct costs incurred on work at the jobsite, as authorized in writing by the Engineer, including costs expended for the protection of the work. An allowance of 5 percent for indirect categories of delay costs will be paid on any reimbursed direct costs, including extended branch and home-office overhead and delay impact costs. No allowance will be made for anticipated profits. Payment for equipment which is ordered to standby during such suspension of work shall be made as described in Subsection 109.06(H) - Idle and Standby Equipment.

(D) Cost Adjustment. If the performance of all or part of the work is suspended for reasons beyond the control of the Contractor except an adjustment shall be made for any increase in cost of performance of this contract (excluding profit) necessarily caused by such suspension, and the contract modified in writing accordingly.

However, no adjustment to the contract price shall be made for any suspension, delay, or interruption:

(1) For weather related conditions.

(2) To the extent that performance would have been so suspended, delayed, or interrupted by any other cause, including the fault or negligence of the Contractor.

(3) Or, for which an adjustment is provided for or excluded under any other provision of this Contract.

(E) Claims for Adjustment. Any adjustment in contract price made shall be determined in accordance with Subsections 104.02 – Changes and 104.06 – Methods of Price Adjustment.

Any claims for such compensation shall be filed in writing with the Engineer within 30 days after the date of the order to resume work or the claim will not be considered. The claim shall conform to the requirements of Subsection 107.15(D) – Making of a Claim. The Engineer will take the claim under consideration, may make such investigations as are deemed necessary and will be the sole judge as to the equitability of the claim. The Engineer's decision will be final.

(F) No Adjustment. No provision of this clause shall entitle the Contractor to any adjustments for delays due to failure of its surety, the cancellation or expiration of any insurance coverage required by the contract documents, for suspensions made at the request of the Contractor, for any delay required under the contract, for suspensions, either partial or whole, made by the Engineer under Subsection 108.10(A)(4) of the "Suspension of work" paragraph.

108.11 Termination of Contract for Cause.

(A) Default. If the Contractor refuses or fails to perform the work, or any separable part thereof, with such diligence as will assure its completion within the time specified in this contract, or any extension thereof, or commits any other material breach of this contract, and further fails within seven days after receipt of written notice from the Engineer to commence and continue correction of the refusal or failure with diligence and promptness, the Engineer may, by written notice to the Contractor, declare the Contractor in breach and terminate the Contractor's right to proceed with the work or the part of the work as to which there has been delay or other breach of contract. In such event, the State may take over the work, perform the same to completion, by contract or otherwise, and may take possession of, and utilize in completing the work, the materials, appliances, and plants as may be on the site of the work and necessary therefore. Whether or not the Contractor's right to proceed with the work is terminated, the Contractor and the Contractor's sureties shall be liable for any damage to the State resulting from the Contractor's refusal or failure to complete the work within the specified time.

(B) Additional Rights and Remedies. The rights and remedies of the State provided in this contract are in addition to any other rights and remedies provided by law.

(C) Costs and Charges. All costs and charges incurred by the State, together with the cost of completing the work under contract, will be

108.12

deducted from any monies due or which would or might have become due to the Contractor had it been allowed to complete the work under the contract. If such expense exceeds the sum which would have been payable under the contract, then the Contractor and the surety shall be liable and shall pay the State the amount of the excess.

In case of termination, the Engineer will limit any payment to the Contractor to the part of the contract satisfactorily completed at the time of termination. Payment will not be made until the work has satisfactorily been completed and all required documents, including the tax clearance required by Subsection 109.11 – Final Payment are submitted by the Contractor. Termination shall not relieve the Contractor or Surety from liability for liquidated damages.

(D) Erroneous Termination for Cause. If, after notice of termination of the Contractor's right to proceed under this section, it is determined for any reason that good cause did not exist to allow the State to terminate as provided herein, the rights and obligations of the parties shall be the same as, and the relief afforded the Contractor shall be limited to, the provisions contained in Subsection 108.12 – Termination for Convenience.

108.12 Termination For Convenience.

(A) Terminations. The Director may, when the interests of the State so require, terminate this contract in whole or in part, for the convenience of the State. The Director will give written notice of the termination to the Contractor specifying the part of the contract terminated and when termination becomes effective.

(B) Contractor's Obligations. The Contractor shall incur no further obligations in connection with the terminated work and on the date set in the notice of termination the Contractor shall stop work to the extent specified. The Contractor shall also terminate outstanding orders and subcontracts as they relate to the terminated work. The Contractor shall settle the liabilities and claims arising out of the termination of subcontracts and orders connected with the terminated work subject to the State's approval. The Engineer may direct the Contractor to assign the Contractor's right, title, and interest under terminated orders or subcontracts to the State. The Contractor must still complete the work not terminated by the notice of termination and may incur obligations as necessary to do so.

(C) Right to Construction and Goods. The Engineer may require the Contractor to transfer title and to deliver to the State in the manner and to the extent directed by the Engineer, the following:

(1) Any completed work.

(2) Any partially completed construction, goods, materials, parts, tools, dies, jigs, fixtures, drawings, information, and contract rights (hereinafter called "construction material") that the Contractor has specifically produced or specially acquired for the performance of the terminated part of this contract.

(3) The Contractor shall protect and preserve all property in the possession of the Contractor in which the State has an interest. If the Engineer does not elect to retain any such property, the Contractor shall use its best efforts to sell such property and construction materials for the State's account in accordance with the standards of HRS Chapter 490:2-706.

(D) Compensation.

(1) The Contractor shall submit a termination claim specifying the amounts due because of the termination for convenience together with cost or pricing data, submitted to the extent required by HAR Subchapter 15, Chapter 3-122. If the Contractor fails to file a termination claim within one year from the effective date of termination, the Engineer may pay the Contractor, if at all, an amount set in accordance with Subsection 108.12(D)(3).

(2) The Engineer and the Contractor may agree to a settlement provided the Contractor has filed a termination claim supported by cost or pricing data submitted as required and that the settlement does not exceed the total contract price plus settlement costs reduced by payments previously made by the State, the proceeds of any sales of construction, supplies, and construction materials under Subsection 108.12(C)(3), and the proportionate contract price of the work not terminated.

(3) Absent complete agreement, the Engineer will pay the Contractor the following amounts less any payments previously made under the contract:

(a) The cost of all contract work performed prior to the effective date of the notice of termination work plus a 5 percent markup on the actual direct costs, including amounts paid to subcontractor, less amounts paid or to be paid for completed portions of such work; provided, however, that if it appears that the Contractor would have sustained a loss if the entire contract would have been completed, no markup shall be allowed or included and the amount of compensation shall

be reduced to reflect the anticipated rate of loss. No anticipated profit or consequential damage will be due or paid.

(b) Subcontractors shall be paid a markup of 10 percent on their direct job costs incurred to the date of termination. No anticipated profit or consequential damage will be due or paid to any subcontractor. These costs must not include payments made to the Contractor for subcontract work during the contract period.

(c) The total sum to be paid the Contractor shall not exceed the total contract price reduced by the amount of any sales of construction supplies, and construction materials.

(4) Cost claimed, agreed to, or established by the State shall be in accordance with HAR Chapter 3-123.

108.13 Pre-Final and Final Inspections.

(A) **Inspection Requirements.** Before the Engineer undertakes a final inspection of any work, a pre-final inspection must first be conducted. The Contractor shall notify the Engineer that the work has reached substantial completion and is ready for pre-final inspection.

(B) **Pre-Final Inspection.** Before notifying the Engineer that the work has reached substantial completion, the Contractor shall inspect the project and test all installed items with all of its subcontractors as appropriate. The Contractor shall also submit the following documents as applicable to the work:

- (1) All written guarantees required by the contract.
- (2) Two accepted final field-posted drawings as specified in Section 648 – Field-Posted Drawings;
- (3) Complete weekly certified payroll records for the Contractor and Subcontractors.
- (4) Certificate of Plumbing and Electrical Inspection.
- (5) Certificate of building occupancy as required.
- (6) Certificate of Soil and Wood Treatments.
- (7) Certificate of Water System Chlorination.

(8) Certificate of Elevator Inspection, Boiler and Pressure Pipe Inspection.

(9) Maintenance Service Contract and two copies of a list of all equipment installed.

(10) Current Tax clearance. The contractor will be required to submit an additional tax clearance certificate when the final payment is made.

(11) And any other final items and submittals required by the contract documents.

(C) Procedure. When in compliance with the above requirements, the Contractor shall notify the Engineer in writing that the project has reached substantial completion and is ready for pre-final inspection.

The Engineer will then make a preliminary determination as to whether or not the project is substantially complete and ready for pre-final inspection. The Engineer may, in writing, postpone until after the pre-final inspection the Contractor's submittal of any of the items listed in Subsection 108.13(B) – Pre-Final Inspection, herein, if in the Engineer's discretion it is in the interest of the State to do so.

If, in the opinion of the Engineer, the project is not substantially complete, the Engineer will provide the Contractor a punchlist of specific deficiencies in writing which must be corrected or finished before the work will be ready for a pre-final inspection. The Engineer may add to or otherwise modify this punchlist from time to time. The Contractor shall take immediate action to correct the deficiencies and must repeat all steps described above including written notification that the work is ready for pre-final inspection.

After the Engineer is satisfied that the project appears substantially complete a final inspection shall be scheduled within ten working days after receipt of the Contractor's latest letter of notification that the project is ready for final inspection.

If, as a result of the pre-final inspection, the Engineer determines the work is not substantially complete, the Engineer will inform the Contractor in writing as to specific deficiencies which must be corrected before the work will be ready for another pre-final inspection. If the Engineer finds the work is substantially complete but finds deficiencies that must be corrected before the work is ready for final inspection, the Engineer will prepare in writing and deliver to the Contractor a punchlist describing such deficiencies.

At any time before final acceptance, the Engineer may revoke the determination of substantial completion if the Engineer finds that it was not warranted and will notify the Contractor in writing the reasons therefore together with a description of the deficiencies negating the declaration.

When the date of substantial completion has been determined by the State, liquidated damages for the failure to complete the punchlist, if due to the State will be assessed in pursuant to Subsection 108.08(B) - Liquidated Damages for Failure to Complete the Punchlist.

(D) Punchlist; Clean Up and Final Inspection. Upon receiving a punchlist after pre-final inspection, the Contractor shall promptly devote all required time, labor, equipment, materials and incidentals to correct and remedy all punchlist deficiencies. The Engineer may add to or otherwise modify this punchlist until substantial completion of the project.

Before final inspection of the work, the Contractor shall clean all ground occupied by the Contractor in connection with the work of all rubbish, excess materials temporary structures and equipment, shall remove all graffiti and defacement of the work and all parts of the work and the worksite must be left in a neat and presentable condition to the satisfaction of the Engineer.

Final inspection will occur within ten working days after the Contractor notifies the Engineer in writing that all punchlist deficiencies remaining after the pre-final inspection have been completed and the Engineer concurs. If the Engineer determines that deficiencies still remain at the final inspection, the work will not be accepted and the Engineer will notify the Contractor, in writing, of the deficiencies which shall be corrected and the steps above repeated.

If the Contractor fails to correct the deficiencies and complete the work by the established or agreed date, the State may correct the deficiencies by whatever method it deems appropriate and deduct the cost from any payments due the Contractor.

108.14 Substantial Completion and Final Acceptance.

(A) Substantial Completion. When the Engineer finds that the Contractor has satisfactorily completed all work for the project in compliance with the contract, with the exception of the planting period and the plant establishment period, the Engineer will notify the Contractor, in writing, of the project's substantial completion, effective as of the date of the final inspection. The substantial completion date shall determine end of contract time and relieve contractor of any additional accumulation of liquidated damages for failure to complete the punchlist.

(B) **Final Acceptance.** When the Engineer finds that the Contractor has satisfactorily completed all contract work in compliance with the contract including all plant establishment requirements, and all the materials have been accepted by the State, the Engineer will issue a Final Acceptance Letter. The Final Acceptance date shall determine the commencement of all guaranty periods subject to Subsection 108.16 – Contractor’s Responsibility for Work; Risk of Loss or Damage.

108.15 Use of Structure or Improvement. The State has the right to use the structure, equipment, improvement, or any part thereof, at any time after it is considered by the Engineer as available. In the event that the structure, equipment or any part thereof is used by the State before final acceptance, the Contractor is not relieved of its responsibility to protect and preserve all the work until final acceptance.

108.16 Contractor’s Responsibility for Work; Risk of Loss or Damage. Until the written notice of final acceptance has been received, the Contractor shall take every precaution against loss or damage to any part of the work by the action of the elements or from any other cause whatsoever, whether arising from the performance or from the non-performance of the work. The Contractor shall rebuild, repair, restore and make good all loss or damage to any portion of the work resulting from any cause before its receipt of the written notice of final acceptance and shall bear the risk and expense thereof.

The risk of loss or damage to the work from any hazard or occurrence that may or may not be covered by a builder’s risk policy is that of the Contractor and Surety, unless such risk of loss is placed elsewhere by express language in the contract documents.

108.17 Guarantee of Work.

(1) Regardless of, and in addition to, any manufacturers’ warranties, all work and equipment shall be guaranteed by the Contractor against defects in materials, equipment or workmanship for one year from the date of final acceptance or as otherwise specified in the contract documents.

(2) When the Engineer determines that repairs or replacements of any guaranteed work and equipment is necessary due to materials, equipment, or workmanship which are inferior, defective, or not in accordance with the terms of the contract, the Contractor shall, at no increase in contract price or contract time, and within five working days of receipt of written notice from the State, commence to all of the following:

(a) Correct all noted defects and make replacements, as directed by the Engineer, in the equipment and work.

(b) Repair or replace to new or pre-existing condition any damages resulting from such defective materials, equipment or installation thereof.

(3) The State will be entitled to the benefit of all manufacturers and installers warranties that extend beyond the terms of the Contractor's guaranty regardless of whether or not such extended warranty is required by the contract documents. The Contractor shall prepare and submit all documents required by the providers of such warranties to make them effective, and submit copies of such documents to the Engineer. If an available extended warranty cannot be transferred or assigned to the State as the ultimate user, the Contractor shall notify the Engineer who may direct that the warranted items be acquired in the name of the State as purchaser.

(4) If a defect is discovered during a guarantee period, all repairs and corrections to the defective items when corrected shall be guaranteed for a new duration equal to the original full guarantee period. The running of the guarantee period shall be suspended for all other work affected by any defect. The guarantee period for all other work affected by any such defect shall restart for its remaining duration upon confirmation by the Engineer that the deficiencies have been repaired or remedied.

(5) Nothing in this section is intended to limit or affect the State's rights and remedies arising from the discovery of latent defects in the work after the expiration of any guarantee period.

108.18 No Waiver of Legal Rights. The following will not operate or be considered as a waiver of any portion of the contract, or any power herein reserved, or any right to damages provided herein or by law:

(1) Any payment for, or acceptance of, the whole or any part of the work.

(2) Any extension of time.

(3) Any possession taken by the Engineer.

A waiver of any notice requirement or of any noncompliance with the contract will not be held to be a waiver of any other notice requirement or any other noncompliance with the contract.

108.19 Final Settlement of Contract.

(A) **Closing Requirements.** The contract will be considered settled after the project acceptance date and when the following items have been satisfactorily submitted, where applicable:

- 1084 (1) All written guarantees required by the contract.
1085
1086 (2) Complete and certified weekly payrolls for the Contractor and
1087 its subcontractor's.
1088
1089 (3) Certificate of plumbing and electrical inspection.
1090
1091 (4) Certificate of building occupancy.
1092
1093 (5) Certificate for soil treatment and wood treatment.
1094
1095 (6) Certificate of water system chlorination.
1096
1097 (7) Certificate of elevator inspection, boiler and pressure pipe
1098 installation.
1099
1100 (8) Tax clearance.
1101
1102 (9) All other documents required by the Contract or by law.
1103

1104 **(B) Failure to Meet Closing Requirements.** The Contractor shall meet
1105 the applicable closing requirements within 60 days from the date of Project
1106 Acceptance or the agreed to Punchlist complete date. Should the
1107 Contractor fail to comply with these requirements, the Engineer may
1108 terminate the contract for cause."
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END OF SECTION 108

1 **SECTION 109 – MEASUREMENT AND PAYMENT**

2
3 Make the following amendment to said Section:

4
5 **(I) Amend Subsection 109.05 Allowances for Overhead and Profit** by
6 revising lines 101 to 110 to read as follows:

7
8 **“(1) 20 percent of the direct cost for any work performed by the**
9 **Contractor’s own labor force.**

10
11 **(2) 20 percent of the direct cost for any work performed by each**
12 **subcontractor’s own labor force.**

13
14 **(3) For the Contractor or any subcontractor for work performed**
15 **by their respective subcontractor or tier subcontractor, 10 percent**
16 **of the amount due to the performing subcontractor or tier**
17 **subcontractor.”**

18
19 **(II) Amend Subsection 109.08(B) Payment for Material On Hand** by
20 revising lines 421 to 423 to read as follows:

21
22 **“(2) The materials shall be stored and handled in accordance**
23 **with Subsection 105.14 – Storage and Handling of Materials and**
24 **Equipment.”**

25
26
27 **(III) Amend Subsection 109.11 Final Payment** by revising lines 568 to 576
28 to read as follows:

29
30 **“(3) A current “Certificate of Vendor Compliance” issued by the**
31 **Hawaii Compliance Express (HCE). The Certificate of Vendor**
32 **Compliance is used to certify the Contractor’s compliance with**

33
34 **(a) Section 103D-328, HRS (for all contracts \$25,000 or**
35 **more) which requires a current tax clearance certificate**
36 **issued by the Hawaii State Department of Taxation and the**
37 **Internal Revenue Service;**

38
39 **(b) Chapters 383, 386, 392, and 393, HRS; and**

40
41 **(c) Subsection 103D-310(c), HRS. The State reserves**
42 **the right to verify that compliance is current prior to the**
43 **issuance of final payment. Contractors are advised that non-**
44 **compliance status will result in final payment being withheld**
45 **until compliance is attained.**

46
47 Sums necessary to meet the claims of any governmental agencies
48 may be withheld from the sums due the Contractor until said

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claims have been fully and completely discharged or otherwise
satisfied."

END OF SECTION 109

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(I) Amend **201.04 – Measurement** by revising lines 167 to 168 to read as follows:

(II) Amend **201.05 – Payment** by revising lines 170 to 179 to read as follows:

The Engineer will pay for the following pay item when included in the proposal schedule:

Clearing and Grubbing	Square Foot

NH-064-1(010)R
201-1a

7/1/18

SECTION 202 – DEMOLITION AND REMOVAL OF STRUCTURES AND OBSTRUCTIONS

Make the following amendments to said Section:

(I) Amend **202.04 – Measurement** by revising lines 119 to 120 to read as follows:

“202.04 Measurement. If the proposal provides a contract item for the removal of structure and obstructions, the Engineer will measure the removal of structures and obstructions by the square foot, each, or linear foot.

(II) Amend 202.05 – Payment by revising lines 122 to 131 to read as follows:

“202.05 Payment. If the proposal does not show a contract item for the removal of structures and obstructions, the Engineer will not pay for the removal of structures and obstructions separately. The Contractor shall consider them incidental to the various contract items.

The Engineer will pay for specific items stipulated for removal and disposal at the contract price bid per unit specified in the proposal. The price shall be full compensation for removal and disposal of that items, excavation, backfill, salvage of materials removed. Salvaging of materials removed includes their custody, preservation, storage on the right-of-way. Also, the price shall be full compensation for equipment, tools, labor materials and incidentals necessary to complete the work.

The Engineer will pay for the following pay item when included in the proposal schedule.

Pay Item	Pay Unit
Demolition and Removal of Existing Street Sign (Including Foundation)	Each
Demolition and Removal of Existing Concrete (Assume 3" Sidewalk And Adjacent Mow Strip)	Square Foot
Demolition and Removal of Existing Fence (Including Foundations)	Linear Foot
Demolition and Removal of Existing Asphalt Pavement And Base Material	Square Foot
Demolition and Removal of Existing Concrete Curb	Linear Foot

47	Saw Cut and Removal of Existing Pavement (Asphalt and Concrete)	Linear Foot
48		
49	Demolish and Removal of 4" Wide Striping	Linear Foot
50		
51	Demolish and Removal of Pavement Arrow Striping	Linear Foot
52		
53	Demolish and Removal of Roadway Raised Pavement Markers	Each"
54		
55		
56	END OF SECTION 202	

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(I) Amend **203.03(C)(2)(a) – Maximum Dry Unit Weight** from line 245 to line 255 to read as follows:

(II) Amend **203.04 – Measurement** by revising lines 345 to 366 to read as follows:

(A) The Engineer will measure roadway excavation per cubic yard. The Engineer will compute quantities of roadway excavation by average end area method and centerline distances. Curvature correction will not be applied to quantities within roadway prism, as indicated in the contract documents. In computing excavation quantities from outside the roadway prism, where roadway centerline is used as a base, curvature correction will be applied when centerline radius is 1,000 feet or less.

(III) Amend **203.05 – Payment** by revising lines 368 to 457 to read as follows:

The Engineer will pay for each of the following pay items when included in the proposal schedule:

The Engineer will pay for:

(1) 15 percent of the contract bid price upon completion of obliterating old roadways and hauling.

(2) 30 percent of the contract bid price upon completion of preparing subgrade.

(3) 40 percent of the contract bid price upon completion of placing selected material in final position, rounding of slopes, and using water for compaction.

(4) 15 percent of the contract bid price upon completion of disposing of surplus excavation material.

The Engineer will pay for accepted quantities of subexcavation, as roadway excavation at the contract unit price per cubic yard, when ordered by the Engineer, for work prescribed in Subsection 203.03(A)(4) – Subexcavation. Payment will be full compensation for the work prescribed therein and in the contract documents.

The Engineer will pay for accepted quantities of unlined gutter excavation as roadway excavation at the contract unit price per cubic yard, when gutter is located as follows: within median area of a divided highway; and between roadbed shoulder and adjacent cut slope. Payment will be full compensation for removing and disposing of excavated material; backfilling and compacting; and for the work prescribed in the contract documents.

The Engineer will not pay for stockpiling selected material, placing selected material in final position, or placing selected material in windrows along tops of roadway slopes for erosion control work, separately and will consider the cost as included in the unit prices for the various excavation contract pay items. The cost is for work prescribed in this section and the contract documents.

The Engineer will not pay for overhaul separately and will consider the cost as included in the unit prices for the various excavation contract pay items. The cost is for work prescribed in this section and the contract documents.

The Engineer will not pay for embankment separately and will consider the cost as included in the unit price for roadway excavation. The cost is for work prescribed in this section and the contract documents.”

END OF SECTION 203

1 Amend **Section 209 - TEMPORARY WATER POLLUTION, DUST, AND EROSION**
2 **CONTROL** to read as follows:

3
4
5 **“SECTION 209 - TEMPORARY WATER POLLUTION, DUST, AND EROSION**
6 **CONTROL**

7
8
9 **209.01 Description.** This section describes the following:

10
11 **(A)** Including detailed plans, diagrams, and written Site-Specific Best
12 Management Practices (BMP); constructing, maintaining, and repairing
13 temporary water pollution, dust, and erosion control measures at the project
14 site, including local material sources, work areas and haul roads; removing
15 and disposing hazardous wastes; control of fugitive dust (defined as
16 uncontrolled emission of solid airborne particulate matter from any source
17 other than combustion); and complying with applicable State and Federal
18 permit conditions.

19
20 **(B)** Work associated with construction stormwater, dewatering, and
21 hydrotesting activities and complying with conditions of the National Pollutant
22 Discharge Elimination System (NPDES) permit(s) authorizing discharges
23 associated with construction stormwater, dewatering, and hydrotesting
24 activities.

25
26 **(C)** Potential pollutant identification and mitigation measures are listed in
27 Appendix A for use in the development of the Contractor’s Site-Specific BMP.

28
29 Requirements of this section also apply to construction support
30 activities including concrete or asphalt batch plants, rock crushing plants,
31 equipment staging yards/areas, material storage areas, excavated material
32 disposal areas, and borrow areas located outside the State Right-of-Way.
33 For areas serving multiple construction projects, or operating beyond the
34 completion of the construction project in which it supports, the Contractor
35 shall be responsible for securing the necessary permits, clearances, and
36 documents, and following the conditions of the permits and clearances, at no
37 cost to the State.

38
39 **209.02 Materials.** Comply with applicable materials described in Chapters 2 and
40 3 of the current HDOT “Construction Best Management Practices Field Manual”. In
41 addition, the materials shall comply with the following:

42
43 **(A) Grass.** Grass shall be a quick growing species such as rye grass,
44 Italian rye grass, or cereal grasses. Grass shall be suitable to the area and
45 provide a temporary cover that will not compete later with permanent cover.
46 Alternative grasses are allowable if acceptable to the Engineer.

47 **(B) Fertilizer and Soil Conditioners.** Fertilizer and soil conditioners shall
48 be a standard commercial grade acceptable to the Engineer. Fertilizer shall
49 conform to Subsection 619.02(H)(1) - Commercial Fertilizer.
50

51 **(C) Hydro-mulching.** Hydro-mulching used as a temporary vegetative
52 stabilization measure shall consist of materials in Subsections 209.02(A) -
53 Grass, and 209.02(B) – Fertilizer and Soil Conditioners. Mulches shall be
54 recycled materials including bagasse, hay, straw, wood cellulose bark, wood
55 chips, or other material acceptable to the Engineer. Mulches shall be clean
56 and free of noxious weeds and deleterious materials. Potable water shall
57 meet the requirements of Subsection 712.01 - Water. Submit alternate
58 sources of irrigation water for the Engineer's acceptance if deviating from
59 712.01 - Water. Installation and other requirements shall be in accordance
60 with portions of Section 641- Hydro-Mulch Seeding including 641.02(D) - Soil
61 and Mulch Tackifier, 641.03(A) – Seeding, and 641.03(B) - Planting Period.
62 Install non-vegetative controls including mulch or rolled erosion control
63 products while the vegetation is being established. Water and fertilize grass.
64 Apply fertilizer as recommended by the manufacturer. Replace grass the
65 Engineer considers unsuitable or sick. Remove and dispose of trash and
66 debris. Remove invasive species. Mow as needed to prevent site or signage
67 obstructions, fire hazard, or nuisance to the public. Do not remove down
68 stream sediment control measures until the vegetation is uniformly
69 established, including no large bare areas, and provides 70 percent of the
70 density of pre-disturbance vegetation. Temporary vegetative stabilization
71 shall not be used longer than one year.
72

73 **(D) Silt Fences.** Comply with ASTM D6462, Standard Practice for Silt
74 Fence Installation.
75

76 Alternative materials or methods to control, prevent, remove and dispose
77 pollution are allowable if acceptable to the Engineer.
78

79 **209.03 Construction.**

81 **(A) Preconstruction Requirements.**

82
83 **(1) Water Pollution, Dust, and Erosion Control Meeting.**
84 Schedule a water pollution, dust, and erosion control meeting with the
85 Engineer after Site-Specific BMP is accepted in writing by the
86 Engineer. Meeting shall be scheduled a minimum of 7 calendar days
87 prior to the Start Work Date. Discuss sequence of work, plans and
88 proposals for water pollution, dust, and erosion control.
89

90 **(2) Water Pollution, Dust, and Erosion Control Submittals.**
91 Submit a Site-Specific BMP Plan within **21** calendar days of **date of**
92 **award**. Submission of complete and acceptable Site-Specific BMP
93 Plan is the sole responsibility of the Contractor and additional contract
94 time will not be issued for delays due to incompleteness. Include the
95 following:

96
97 **(a)** Written description of activities to minimize water
98 pollution and soil erosion into State waters, drainage or sewer
99 systems. BMP shall include the following:

- 100 **1.** An identification of potential pollutants and their
101 sources.
- 102 **2.** A list of all materials and heavy equipment to be
103 used during construction.
- 104 **3.** Descriptions of the methods and devices used to
105 minimize the discharge of pollutants into State waters,
106 drainage or sewer systems.
- 107 **4.** Details of the procedures used for the
108 maintenance and subsequent removal of any erosion or
109 siltation control devices.
- 110 **5.** Methods of removing and disposing hazardous
111 wastes encountered or generated during construction.
- 112 **6.** Methods of removing and disposing concrete and
113 asphalt pavement cutting slurry, concrete curing water,
114 and hydrodemolition water.
- 115 **7.** Spill Control and Prevention and Emergency Spill
116 Response Plan.
- 117 **8.** Fugitive dust control, including dust from grinding,
118 sweeping, or brooming off operations or combination
119 thereof.
- 120 **9.** Methods of storing and handling of oils, paints
121 and other products used for the project.
- 122 **10.** Material storage and handling areas, and other
123 staging areas.
- 124 **11.** Concrete truck washouts.

136 **12.** Concrete waste control.

137
138 **13.** Fueling and maintenance of vehicles and other
139 equipment.

140
141 **14.** Tracking of sediment offsite from project entries
142 and exits.

143
144 **15.** Litter management.

145
146 **16.** Toilet facilities.

147
148 **17.** Other factors that may cause water pollution, dust
149 and erosion control.

150
151 **(b)** Provide plans indicating location of water pollution, dust
152 and erosion control devices; provide plans and details of BMPs
153 to be installed or utilized; show areas of soil disturbance in cut
154 and fill, indicate areas used for construction staging and
155 storage including items (1) through (17) above, storage of
156 aggregate (indicate type of aggregate), asphalt cold mix, soil or
157 solid waste, equipment and vehicle parking, and show areas
158 where vegetative practices are to be implemented. Indicate
159 intended drainage pattern on plans. Include flow arrows.
160 Include separate drawing for each phase of construction that
161 alters drainage patterns. Indicate approximate date when
162 device will be installed and removed.

163
164 **(c)** Construction schedule.

165
166 **(d)** Name(s) of specific individual(s) designated responsible
167 for water pollution, dust, and erosion controls on the project
168 site. Include home, cellular, and business telephone numbers,
169 fax numbers, and e-mail addresses.

170
171 **(e)** Description of fill material to be used.

172
173 **(f)** For projects with an NPDES Permit for Construction
174 Activities, submit information to address all sections in the
175 Storm Water Pollution Prevention Plan (SWPPP).

176
177 **(g)** For projects with an NPDES Permit, information required
178 for compliance with the conditions of the Notice of General
179 Permit Coverage (NGPC)/NPDES Permit.

181 (h) Site-Specific BMP Review Checklist. The checklist may
182 be downloaded from HDOT's Stormwater Management
183 website at <http://stormwaterhawaii.com>.
184

185 Date and sign Site-Specific BMP Plan. Keep accepted
186 copy on site or at an accessible location so that it can be made
187 available at the time of an on-site inspection or upon request by
188 the Engineer, HDOT Third-Party Inspector, and/or DOH/EPA
189 Representative. Amendments to the Site-Specific BMP Plan
190 shall be included with original Site-Specific BMP Plan. Modify
191 SWPPP if necessary to conform to revisions. Include date of
192 installation and removal of Site-Specific BMP measures.
193 Obtain written acceptance by the Engineer before
194 implementing revised Site-Specific BMPs in the field.
195

196 Follow the guidelines in the current HDOT "Construction
197 Best Management Practices Field Manual", in developing,
198 installing, and maintaining Site-Specific BMPs for all projects.
199 For any conflicting requirements between the Manual and
200 applicable bid documents, the applicable bid documents will
201 govern. Should a requirement not be clearly described within
202 the applicable bid documents, notify the Engineer immediately
203 for interpretation. For the purposes of clarification "applicable
204 bid documents" include the construction plans, standard
205 specifications, special provisions, Permits, and the SWPPP
206 when applicable.
207

208 Follow Honolulu's City and County "Rules for Soil
209 Erosion Standards and Guidelines" for all projects on Oahu.
210 Use respective Soil Erosion Guidelines for Maui, Kauai and
211 Hawaii projects.
212

213 **(B) Construction Requirements.** Do not begin work until submittals
214 detailed in Subsection 209.03(A)(2) - Water Pollution, Dust, and Erosion
215 Control Submittals are completed and accepted in writing by the Engineer.
216

217 Install, maintain, monitor, repair and replace site-specific BMP
218 measures, such as for water pollution, dust and erosion control; installation,
219 monitoring, and operation of hydrotesting activities; removal and disposal of
220 hazardous waste indicated on plans, concrete cutting slurry, concrete curing
221 water; or hydrodemolition water. Site-Specific BMP measures shall be in
222 place, functional and accepted by HDOT personnel prior to initiating any
223 ground disturbing activities.
224

If necessary, furnish and install rain gage in a secure location prior to field work including installation of site-specific BMP. Provide rain gage with a tolerance of at least 0.05 inches of rainfall. Install rain gage on project site in an area that will not deter rainfall from entering the gate opening. Do not install in a location where rain water may splash into rain gage. The rain gage installation shall be stable and plumbed. Maintain rain gage and replace rain gage that is stolen, does not function properly or accurately, is worn out, or needs to be relocated. Do not begin field work until rain gage is installed and Site-Specific BMPs are in place. Rain gage data logs shall be readily available. Submit rain gage data logs weekly to the Engineer.

Address all comments received from the Engineer.

Modify and resubmit plans and construction schedules to correct conditions that develop during construction which were unforeseen during the design and pre-construction stages.

Coordinate temporary control provisions with permanent control features throughout the construction and post-construction period.

Limit maximum surface area of earth material exposed at any time to 300,000 square feet. Do not expose or disturb surface area of earth material (including clearing and grubbing) until BMP measures are installed and accepted in writing by the Engineer. Protect temporarily or permanently disturbed soil surface from rainfall impact, runoff and wind before end of the work day.

Immediately initiate stabilizing exposed soil areas upon completion of earth disturbing activities for areas permanently or temporarily ceased on any portion of the site. Earth-disturbing activities have permanently ceased when clearing and excavation within any area of the construction site that will not include permanent structures has been completed. Earth-disturbing activities have temporarily ceased when clearing, grading, and excavation within any area of the site that will not include permanent structures will not resume for a period of 14 or more calendar days, but such activities will resume in the future. The term "immediately" is used in this section to define the deadline for initiating stabilization measures. "Immediately" means as soon as practicable, but no later than the end of the next work day, following the day when the earth-disturbing activities have temporarily or permanently ceased.

For projects with an NPDES Permit for Construction activities:

(1) For construction areas discharging into **waters not impaired for** nutrients or sediments, complete initial stabilization within 14 calendar days after the temporary or permanent cessation of earth-disturbing activities.

(2) For construction areas discharging into nutrient or sediment impaired waters, complete initial stabilization within 7 calendar days after the temporary or permanent cessation of earth-disturbing activities.

For projects without an NPDES Permit for Construction activities, complete initial stabilization within 14 calendar days after the temporary or permanent cessation of earth-disturbing activities.

Any of the following types of activities constitutes initiation of stabilization:

(1) Prepping the soil for vegetative or non-vegetative stabilization;

(2) Applying mulch or other non-vegetative product to the exposed area;

(3) Seeding or planting the exposed area;

(4) Starting any of the activities in items (1) – (3) above on a portion of the area to be stabilized, but not on the entire area; and

(5) Finalizing arrangements to have stabilization product fully installed in compliance with the deadline for completing initial stabilization activities.

Any of the following types of activities constitutes completion of initial stabilization activities:

(1) For vegetative stabilization, all activities necessary to initially seed or plant the area to be stabilized; and/or

(2) For non-vegetative stabilization, the installation or application of all such non-vegetative measures.

If the Contractor is unable to meet the deadlines above due to circumstances beyond the Contractor's control, and the Contractor is using vegetative cover for temporary or permanent stabilization, the Contractor may comply with the following stabilization deadlines instead as agreed to by the Engineer:

314 (1) Immediately initiate, and complete within the timeframe shown
315 above, the installation of temporary non-vegetative stabilization
316 measures to prevent erosion;

317
318 (2) Complete all soil conditioning, seeding, watering or irrigation
319 installation, mulching, and other required activities related to the
320 planting and initial establishment of vegetation as soon as conditions
321 or circumstances allow it on the site; and

322
323 (3) Notify and provide documentation to the Engineer the
324 circumstances that prevent the Contractor from meeting the deadlines
325 above for stabilization and the schedule the Contractor will follow for
326 initiating and completing initial stabilization and as agreed to by the
327 Engineer.

328
329 Follow the applicable requirements of the specifications and special
330 provisions including Section 619 Planting and Section 641 Hydro-Mulch
331 Seeding.

332
333 Immediately after seeding or planting the area to be vegetatively
334 stabilized, to the extent necessary to prevent erosion on the seeded or
335 planted area, select, design, and install non-vegetative erosion controls that
336 provide cover (e.g., mulch, rolled erosion control products) to the area while
337 vegetation is becoming established.

338
339 Protect exposed or disturbed surface area with mulches, grass seeds
340 or hydromulch. Spray mulches at a rate of 2,000 pounds per acre. Add
341 tackifier to mix at a rate of 85 pounds per acre. Apply grass seeds at a rate
342 of 125 pounds per acre. For hydromulch, use the ingredients and rates
343 required for mulches and grass seeds. Submit recommendations from a
344 licensed Landscape Architect when deviating from the application rates
345 above.

346
347 Apply fertilizer to mulches, grass seed or hydromulch per
348 manufacturer's recommendations. Submit recommendations from a licensed
349 Landscape Architect when deviating from the manufacturer's
350 recommendations.

351
352 Install velocity dissipation measures when exposing erodible surfaces
353 greater than 15 feet in height.

354
355 BMP measures shall be in place and operational at the end of work
356 day or as required by Section 209.03(B) Construction Requirements.

Install and maintain either or both stabilized construction entrances and wheel washes to minimize tracking of dirt and mud onto roadways. Restrict traffic to stabilized construction areas only. Clean dirt, mud, or other material tracked onto the road, sidewalk, or other paved area by the end of the same day in which the track-out occurs. Modify stabilized construction entrances to prevent mud from being tracked onto road. Stabilize entire access roads if necessary.

Chemicals may be used as soil stabilizers for either or both erosion and dust control if acceptable to the Engineer.

Provide temporary slope drains of rigid or flexible conduits to carry runoff from cuts and embankments. Provide portable flume at the entrance. Shorten or extend temporary slope drains to ensure proper function.

Protect ditches, channels, and other drainageways leading away from cuts and fills at all times by either:

- (1) Hydro-mulching the lower region of embankments in the immediate area.
- (2) Installing check dams and siltation control devices.
- (3) Other methods acceptable to the Engineer.

Provide for controlled discharge of waters impounded, directed, or controlled by project activities or erosion control measures.

Cover exposed surface of materials completely with tarpaulin or similar device when transporting aggregate, soil, excavated material or material that may be source of fugitive dust.

Cleanup and remove any pollutant that can be attributed to the Contractor.

Install or modify Site-Specific BMP measures due to change in the Contractor's means and methods, or for omitted condition that should have been allowed for in the accepted Site-Specific BMP or a Site-Specific BMP that replaces an accepted Site-Specific BMP that is not satisfactorily performing. Modifications to Site-Specific BMP measures shall be accepted in writing by the Engineer prior to implementation.

Properly maintain all Site-Specific BMP measures.

For projects with an NPDES Permit for Construction Activities:

(1) For construction areas discharging into nutrient or sediment impaired waters, inspect, prepare a written report, and make repairs to BMP measures at the following intervals:

(a) Weekly.

(b) Within 24 hours of any rainfall of 0.25 inch or greater which occurs in a 24-hour period.

(c) When existing erosion control measures are damaged or not operating properly as required by Site-Specific BMP.

(2) For construction areas discharging to waters not impaired for nutrients or sediments, inspect, prepare a written report, and make repairs to BMP measures at the following intervals:

(a) Weekly.

(b) When existing erosion control measures are damaged or not operating properly as required by Site-Specific BMP.

For projects without an NPDES Permit for Construction activities, inspect, prepare a written report, and make repairs to BMP measures at the following intervals:

(a) Weekly.

(b) When existing erosion control measures are damaged or not operating properly as required by Site-Specific BMP.

Temporarily remove, replace or relocate any Site-Specific BMP that must be removed, replaced or relocated due to potential or actual flooding, or potential danger or damage to project or public.

Maintain records of inspections of Site-Specific BMP work. Keep continuous records for duration of the project. Submit copy of Inspection Report to the Engineer within 24 hours after each inspection.

The Contractor's designated representative specified in Subsection 209.03(A)(2)(d) shall address any Site-Specific BMP deficiencies brought up by the Engineer immediately, including weekends and holidays, and complete work to fix the deficiencies by the close of the next work day if the problem does not require significant repair or replacement, or if the problem can be corrected through routine maintenance. Address any Site-Specific BMP deficiencies brought up by the State's Third-Party Inspector in the timeframe above or as specified in the Consent Decree or MS4 NPDES

Permit, whichever is more stringent. The Consent Decree timeframe requirement applies statewide. The MS4 NPDES Permit only applies to Oahu. In this section, "immediately" means the Contractor shall take all reasonable measures to minimize or prevent discharge of pollutants until a permanent solution is installed and made operational. If a problem is identified at a time in the day in which it is too late to initiate repair, initiation of repair shall begin on the following work day. When installation of a new pollution prevention control or a significant repair is needed, complete installation or repair no later than 7 calendar days from the time of notification/Contractor discovery. Notify the Engineer and document why it is infeasible to complete the installation or repair within 7 calendar days and complete the work as soon as practicable and as agreed to by the Engineer. Address Site-Specific BMP deficiencies discovered by the Contractor within the timeframe above. The Contractor's failure to satisfactorily address these Site-Specific BMP deficiencies, the Engineer reserves the right to employ outside assistance or use the Engineer's own labor forces to provide necessary corrective measures. The Engineer will charge the Contractor such incurred costs plus any associated project engineering costs. The Engineer will make appropriate deductions from the Contractor's monthly progress estimate. Failure to apply Site-Specific BMP measures may result in one or more of the following: assessment of liquidated damages, suspension, or cancellation of Contract with the Contractor being fully responsible for all additional costs incurred by the State.

(C) Discharges of Storm Water Associated with Construction Activities. If work includes disturbance of one acre or more, an NPDES Permit authorizing Discharges of Storm Water Associated with Construction Activity (CWB-NOI Form C) or Individual Permit authorizing storm water discharges associated with construction activity is required from the Department of Health Clean Water Branch (DOH-CWB).

Do not begin construction activities until all required conditions of the permit are met and submittals detailed in Subsection 209.03(A)(2) – Water Pollution, Dust, and Erosion Control Submittals are completed and accepted in writing by the Engineer.

(D) Discharges Associated with Hydrotesting Activities. If hydrotesting activities require effluent discharge into State waters or drainage systems, an NPDES Hydrotesting Waters Permit (CWB-NOI Form F) or Individual Permit authorizing discharges associated with hydrotesting from DOH-CWB is required from the DOH-CWB.

Do not begin hydrotesting activities until the DOH-CWB has issued an Individual NPDES Permit or Notice of General Permit Coverage (NGPC). Conduct Hydrotesting operations in accordance with the conditions of the permit or NGPC.

(E) Discharges Associated with Dewatering Activities. If dewatering activities require effluent discharge into State waters or drainage systems, an NPDES Dewatering Permit (CWB-NOI Form G) or Individual Permit authorizing discharges associated with dewatering from DOH-CWB is required from the DOH-CWB.

Do not begin dewatering activities until the DOH-CWB has issued an Individual NPDES Permit or Notice of General Permit Coverage (NGPC). Conduct dewatering operations in accordance with the conditions of the permit or NGPC.

(F) Solid Waste. Submit the Solid Waste Disclosure Form for Construction Sites to the Engineer within 21 calendar days of date of award. Provide a copy of all the disposal receipts from the facility permitted by the Department of Health to receive solid waste to the Engineer monthly. This should also include documentation from any intermediary facility where solid waste is handled or processed, or as directed by the Engineer.

(G) Construction BMP Training. The Contractor's representative responsible for development of the Site-Specific BMP Plan and implementation of Site-Specific BMPs in the field shall attend the State's Construction Best Management Practices Training. The Contractor shall keep training logs updated and readily available.

209.04 Measurement.

(A) Installation, maintenance, monitoring, and removal of BMP will be paid on a lump sum basis. Measurement for payment will not apply.

(B) The Engineer will only measure additional water pollution, dust and erosion control required and requested by the Engineer on a force account basis in accordance with Subsection 109.06 – Force Account Provisions and Compensation.

209.05 Payment. The Engineer will pay for accepted pay items listed below at contract price per pay unit, as shown in the proposal schedule. Payment will be full compensation for work prescribed in this section and contract documents.

The Engineer will pay for each of the following pay items when included in proposal schedule:

Pay Item	Pay Unit
Installation, Maintenance, Monitoring, and Removal of BMP	Lump Sum
Additional Water Pollution, Dust, and Erosion Control	Force Account

543 An estimated amount for force account is allocated in proposal schedule
544 under 'Additional Water Pollution, Dust, and Erosion Control', but actual amount to
545 be paid will be the sum shown on accepted force account records, whether this sum
546 be more or less than estimated amount allocated in proposal schedule. The
547 Engineer will pay for BMP measures requested by the Engineer that are beyond
548 scope of accepted Site-Specific BMP on a force account basis.

549
550 No progress payment will be authorized until the Engineer accepts in writing
551 Site-Specific BMP or when the Contractor fails to maintain project site in accordance
552 with accepted BMP.

553
554 For all citations or fines received by the Department for non-compliance,
555 including compliance with NPDES Permit conditions, the Contractor shall reimburse
556 State within 30 calendar days for full amount of outstanding cost State has incurred,
557 or the Engineer will deduct cost from progress payment.

558
559 The Engineer will assess liquidated damages up to \$27,500 per day for non-
560 compliance of each BMP requirement and all other requirements in this section.
561

Appendix A

The following list identifies potential pollutant sources and corresponding BMPs used to mitigate the pollutants. Each BMP is referenced to the corresponding section of the current HDOT Construction Best Management Practices Field Manual or appropriate Supplemental Sheets. The Manual may be obtained from the HDOT Statewide Stormwater Management Program Website at <http://www.stormwaterhawaii.com/resources/contractors-and-consultants/> under Construction Best Management Practices Field Manual. Supplemental BMP sheets are located at <http://www.stormwaterhawaii.com/resources/contractors-and-consultants/storm-water-pollution-prevention-plan-swppp/> under Concrete Curing and Irrigation Water.

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
Construction debris, green waste, general litter	• Separate contaminated clean up materials from construction and demolition (C&D) wastes. • Provide waste containers (e.g., dumpster or trash receptacle) of sufficient size and number to contain construction and domestic wastes. • Inspect construction waste and recycling areas regularly. • Schedule solid waste collection regularly. • Schedule recycling activities based on construction/demolition phases. • Empty waste containers weekly or when they are two-thirds full, whichever is sooner. • Do not allow containers to overflow. Clean up immediately if they do. • On work days, clean up and dispose of waste in designated waste containers. • See Solid Waste Management Section SM-6 for additional requirements. • Provide Storm Drain Inlet Protection and/or Perimeter Sediment Controls as applicable. • Collect and dispose of all waste materials in trash dumpsters. Place dumpsters, with secure watertight lids, away from storm water conveyances and drains, in a covered materials storage area. • Dispose of construction and non- construction solid waste in accordance with State DOH regs. • Load removed non- recyclable vegetation directly onto trucks; cover and transport to a licensed facility	See Solid Waste Management Section SM-6. Storm Drain Inlet Protection SC-1, and Perimeter Sediment Controls where applicable.

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
Materials associated with the operation and maintenance of equipment, such as oil, fuel, and hydraulic fluid leakage	• Use off-site wash racks, repair and maintenance facilities, and fueling sites when practical. • Designate bermed wash area if cleaning on site is necessary. • Place drip pans or drop cloths under vehicles and equipment to absorb spills or leaks. • Provide an ample supply of readily available spill cleanup materials. • Clean up spills immediately, using dry clean-up methods where possible, and dispose of used materials properly. • Do not clean surfaces or spills by hosing the area down. • Eliminate the source of the spill to prevent a discharge or a continuation of an ongoing discharge. • Inspect on-site vehicles and equipment regularly and immediately repair leaks. • Regularly inspect fueling areas and storage tanks. • Train employees on proper maintenance and spill practices and procedures and fueling and cleanup procedures. • Store diesel fuel, oil, hydraulic fluid, or other petroleum products or other chemicals in water-tight containers and provide cover or secondary containment. • Do not remove original product labels and comply with manufacturer's labels for proper disposal. • Dispose of containers only after all the product has been used. • Dispose of or recycle oil or oily wastes according to Federal, State, and Local requirements. • Store soaps, detergents, or solvents under cover or other means to prevent contact with rainwater. • See Vehicle and Equipment Cleaning, Maintenance, and Refueling, Sections SM-11, SM-12, and SM-13 and Material Storage and Handling Section SM-2 for additional requirements.	See Vehicle and Equipment Cleaning, Maintenance, and Refueling, Sections SM-11, SM-12, and SM-13, and Material Storage and Handling , Section SM-2, and Spill Prevention and Control SM-10.

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
Soil erosion from the disturbed areas	• Provide Soil Stabilization, Slope Protection, Storm Drain Inlet Protection SC-1, Perimeter Controls and Sediment Barriers, Sediment Basins and Detention Ponds, Check Dams SC-3 ,Level Spreader EC-6, Paving Operations SM-20, Construction Roads and Parking Area Stabilization SC-10, Controlling Storm Water Flowing Onto and Through the Project, Post-Construction BMPs, and Non-Structural BMPs (Construction BMP Training SM-1, Scheduling SM-14, Location of Potential Sources of Sediment SM-15, Preservation of Existing Vegetation SM-17). • Delineate, and clearly mark off, with flags, tape, or other similar marking device all natural buffer areas defined in the SWPPP. • Preserve native topsoil where practicable. • In areas where vegetative stabilization will occur, restrict vehicle/equipment use in areas to avoid soil compaction or condition soil to promote vegetative growth. • For Storm Drain Inlet Protection, clean, or remove and replace, the protection measures as sediment accumulates, the filter becomes clogged, and/or performance is compromised. • Where there is evidence of sediment accumulation adjacent to the inlet protection measure, remove the deposited sediment by the end of the same day in which it is found or by the end of the following work day if removal by the same day is not feasible. • Sediment basins shall be designed and maintained in accordance with HAR Chapter 11-55. • Minimize disturbance on steep slopes (Greater than 15% in grade). • If disturbance of steep slopes are unavoidable, phase disturbances and use stabilization techniques designed for steep grades. • For temporary drains and swales use velocity dissipation devices within and at the outlet to minimize erosive flow velocities.	Soil Stabilization 1. SM-22 Topsoil Management 2. EC-12 Seeding and Planting 3. EC-14 Mulching 4. EC-11 Geotextiles and Mats Slope Protection 1. EC-12 Seeding and Planting 2. EC-14 Mulching 3. EC-11 Geotextiles and Mats 4. EC-4 Slope Roughening, Terracing, and Rounding 5. EC-7 Slope Drains and Subsurface Drains 6. EC-9 Slope Interceptor or Diversion Ditches/Berms SC-1 Storm Drain Inlet Protection

<i>Pollutant Source</i>	<i>Appropriate Site-Specific BMP to be Implemented</i>	<i>BMP Requirements</i>
		<i>Perimeter Controls and Sediment Barriers</i> 1. SC-7 Silt Fence <i>or Filter Fabric Fence</i> 2. SC-2 Vegetated Filter Strips and Buffers 3. SC-6 Compost Filter Berm/<i>Sock</i> 4. SC-8 Sandbag Barrier 5. SC-9 Brush or Rock Filter <i>Sediment Basins and Detention Ponds</i> 1. SC-4 Sediment Trap 2. SC-5 Sediment Basin SC-3 Check Dams <i>EC-6 Level Spreader</i> <i>SM-20 Paving Operations</i> <i>SC-10 Construction Roads and Parking Area Stabilization</i>

<i>Pollutant Source</i>	<i>Appropriate Site-Specific BMP to be Implemented</i>	<i>BMP Requirements</i>
		Controlling Storm Water Flowing onto and Through the Project 1. EC-3 Run-On Diversion 2. EC-5 Earth Dike, Swales and Ditches Post Construction BMPs 1. EC-2 Flared Culvert End Sections 2. EC-10 Rip-Rap and Gabion Inflow Protection 3. EC-8 Outlet Protection and Velocity Dissipation Devices 4. SM-22 Topsoil Management Non-Structural BMPs 1. SM-1 Construction BMP Training 2. SM-14 Scheduling 3. SM-15 Location of Potential Sources of Sediment 4. SM-17 Preservation of Existing Vegetation

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
<i>Sediment from soil stockpiles</i>	• Locate stockpiles a minimum of 50 feet or as far as practicable from concentrated runoff or outside of any natural buffers identified on the SWPPP. • Place bagged materials on pallets and under cover. • Provide physical diversion to protect stockpiles from concentrated runoff. • Cover stockpiles with plastic or comparable material when practicable. • Place silt fence, fiber filtration tubes, or straw wattles around stockpiles. • Do not hose down or sweep soil or sediment accumulated on pavement or other impervious surfaces into any storm water conveyance (unless connected to a sediment basin, sediment trap, or similarly effective control), storm drain inlet, or state water. • Unless infeasible, contain and securely protect stockpiles from the wind. • Provide Storm Drain Inlet Protection and/or Perimeter Sediment Controls as applicable. See Stockpile Management Section SM-3 for additional requirements.	See Stockpile Management Section SM-3. Storm Drain Inlet Protection SC-1, and Perimeter Sediment Controls where applicable.
<i>Emulsified asphalt or prime/tack coat</i>	• Provide training for employees and contractors on proper material delivery and storage practices and procedures. • Restrict paving operations during wet weather to prevent paving materials from being discharged. • Use asphalt emulsions such as prime coat when possible. • Protect drain inlet structures and manholes during application of tack coat, seal coat, slurry seal, and fog seal. • Keep ample supplies of drip pans and absorbent materials on site. • Inspect inlet protection devices. • See Material Storage and Handling Section SM-2 and Paving Operations Section SM-20 for additional requirements. • Provide Storm Drain Inlet Protection and/or Perimeter Sediment Controls as applicable.	See Material Storage and Handling Section SM-2, and Stockpile Management Section SM-3, Paving Operations Section SM-20, Storm Drain Inlet Protection SC-1, and Perimeter Sediment Controls where applicable.

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
Materials associated with painting, such as paint and paint wash solvent	• Hazardous chemicals shall be well-labeled and stored in original containers. • Keep ample supply of cleanup materials on site. • Dispose container only after all of the product has been used. • Remove as much paint from brushes on painted surface. • Rinse from water-based paints shall be discharged into the sanitary sewer system where possible. If not, direct all washwater into a leak-proof container or leak-proof pit. The container or pit must be designed so that no overflows can occur due to inadequate sizing or precipitation. • Locate on-site wash area a minimum of 50 feet away or as far as practicable from storm drain inlets, open drainage facilities, or water bodies. • Do not dump liquid wastes into the storm drainage system. • Filter and re-use solvents and thinners. • Dispose of oil-based paints and residue as a hazardous waste. • Ensure collection, removal, and disposal of hazardous waste complies with regulations. • Immediately clean up spills and leaks. • Properly store paints, solvents, and epoxy compounds. • Properly store and dispose waste materials generated from painting and structure repair and construction activities. • Mix paints in a covered and contained area, when possible, to minimize adverse impacts from spills. • Do not apply traffic paint or thermoplastic if rain is forecasted. • See Material Storage and Handling Use SM-2, Hazardous Materials and Waste Management Section SM-9, Spill Prevention and Control Section SM-10, and Structure Construction and Painting Section SM-21 for additional requirements. Provide Storm Drain Inlet Protection and/or Perimeter Sediment Controls as applicable.	See Material Storage and Handling Use Section SM-2, Stockpile Management Section SM-3, Hazardous Materials and Waste Management Section SM-9, Waste Management, Spill Prevention and Control Section SM-10, and Structure Construction and Painting Section SM-21, Storm Drain Inlet Protection SC-1, and Perimeter Sediment Controls where applicable.

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
<i>Industrial chemicals, fertilizers, and/or pesticides</i>	• <i>Hazardous chemicals shall be well-labeled and stored in original containers.</i> • <i>Keep ample supply of cleanup materials on site.</i> • <i>Clean up spills immediately, using dry clean-up methods where possible, and dispose of used materials properly.</i> • <i>Do not clean surfaces or spills by hosing the area down.</i> • <i>Eliminate the source of the spill to prevent a discharge or a furtherance of an ongoing discharge.</i> • <i>Dispose container only after all of the product has been used.</i> • <i>Retain a complete set of safety data sheets (formerly MSDS) on site.</i> • <i>Store industrial chemicals in water-tight containers and provide either cover or secondary containment.</i> • <i>Provide cover when storing fertilizers or pesticides to prevent these chemicals from coming into contact with rainwater.</i> • <i>Restrict amount of pesticide prepared to quantity necessary for the current application.</i> • <i>Do not apply fertilizers or pesticides during or just before a rain event.</i> • <i>Do not apply to stormwater conveyance channels with flowing water.</i> • <i>Comply with fertilizer and pesticide manufacturer's recommended usage and disposal instructions. Document departures from manufacturer's specifications in Attachment J.</i> • <i>Apply fertilizers at the appropriate time of year for the location, and preferably timed to coincide as closely as possible to the period of maximum vegetation uptake and growth.</i> • <i>Follow federal, state, and local laws regarding fertilizer application.</i> • <i>Do not dispose of toxic liquid wastes (solvents, used oils, and paints) or chemicals (additives, acids, and curing compounds) in dumpsters allocated for construction debris.</i>	See Material Storage and Handling Use Section SM-2, Stockpile Management Section SM-3, and Hazardous Materials and Waste Management Section SM-9, and Spill Prevention and Control SM-10

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
	• Ensure collection, removal, and disposal of hazardous waste complies with regulations. Hazardous waste that cannot be reused or recycled shall be disposed of by a licensed hazardous waste hauler. See Material Storage and Handling Use SM-2, and Hazardous Materials and Waste Management Section SM-9 for additional requirements.	
Hazardous waste (Batteries, Solvents, Treated Lumber, etc.)	• Do not dispose of toxic materials in dumpsters allocated for construction debris. • Ensure collection, removal, and disposal of hazardous waste complies with regulations. • Hazardous waste that cannot be reused or recycled shall be disposed of by a licensed hazardous waste hauler. • Segregate and recycle wastes from vehicle/equipment maintenance activities such as used oil or oil filters, greases, cleaning solutions, antifreeze, automotive batteries, and hydraulic and transmission fluids. • Store waste in sealed containers, which are constructed of suitable materials to prevent leakage and corrosion, and which are labeled in accordance with applicable Resource Conservation and Recovery Act (RCRA) requirements and all other applicable federal, state, and local requirements. • All containers stored outside shall be kept away from surface waters and within appropriately sized secondary containment (e.g., spill berms, decks, spill containment pallets). Provide cover if possible. • Clean up spills immediately, using dry clean-up methods where possible, and dispose of used materials properly. • Do not clean surfaces or spills by hosing the area down. • Eliminate the source of the spill to prevent a discharge or a continuation of an ongoing discharge.	See Hazardous Materials and Waste Management Section SM-9 and Vehicle and Equipment Maintenance SM-12

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
	• Ensure collection, removal, and disposal of hazardous waste complies with manufacturer's recommendations and is in compliance with federal, state, and local requirements. • See Hazardous Materials and Waste Management Section SM-9 and Vehicle and Equipment Management, Vehicle and Equipment Maintenance SM-12 for additional requirements.	
Metals and Building Materials	• Inspect construction waste and recycling areas regularly. • Schedule solid waste collection regularly. • If building materials or metals are stored on site (such as rebar or galvanized poles) store under cover under tarps or in containers. • Minimize the amount of material stored on site. • Do not stockpile uncovered metals or other building materials in close proximity to discharge points. • See Solid Waste Management Section SM-6 for additional requirements.	See Solid Waste Management Section SM-6
Contaminated Soil	• See Waste Management, Contaminated Soil Management Section SM-8 and/or Hazardous Materials and Waste Management Section SM-9 for additional requirements. • At minimum contain contaminated material soil by surrounding with impermeable lined berms or cover exposed contaminated material with plastic sheets.	See Waste Management, Contaminated Soil Management Section SM-8 and/or Hazardous Materials and Waste Management Section SM-9

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
<i>Fugitive Dust Control and Dust Control Water</i>	- Do not over spray water for dust control purposes which will result in runoff from the area. - Apply water as conditions require. - Washing down of debris or dirt into drainage, sewage systems, or State waters is not allowed. <i>Minimize exposed areas through the schedule of construction activities.</i> <i>Utilize vegetation, mulching, sprinkling, and stone/gravel layering to quickly stabilize exposed soil.</i> <i>Direct construction vehicle traffic to stabilized roadways.</i> <i>Cover dump trucks hauling material from the site with a tarpaulin.</i> See Dust Control Section SM-19 for additional requirements.	See Dust Control Section SM-19
<i>Concrete Truck Wash Water</i>	- Disposal of concrete truck wash water via percolation is prohibited. - Wash concrete-coated vehicles or equipment off-site or in the designated wash area. - Locate on-site wash area a minimum of 50 feet away or as far as practicable from storm drain inlets, open drainage facilities, or water bodies. - Runoff from the on-site concrete wash area shall be contained in a temporary pit or level bermed area where the concrete can set. - Design the area so that no overflow can occur due to inadequate wash area sizing or precipitation. - The temporary pit shall be lined with plastic to prevent seepage of wash water into the ground. - Allow wash water to evaporate or collect wash water and all concrete debris in a concrete washout system bin. - Do not dump liquid wastes into storm drainage system. - Dispose of liquid and solid concrete wastes in compliance with federal, state, and local standards. - See Waste Management, Concrete <i>Wash and</i> Waste Management Section SM-4 for additional requirements.	See Waste Management, Concrete <i>Wash and</i> Waste Management Section SM-4

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
<i>Sediment Track-Out</i>	• <i>Include Stabilized Construction Entrance at all points that exit onto paved roads.</i> • <i>A sediment trapping device is required if a wash rack is used in conjunction with the stabilized construction entrance/exit.</i> • <i>The pavement shall not be cleaned by washing down the street.</i> • <i>If sweeping is ineffective or it is necessary to wash the streets, wash water must be contained either by construction of a sump, diverting the water to an acceptable disposal area, or vacuuming the wash water.</i> • <i>Use BMPs for adjacent drainage structures.</i> • <i>Remove sediment tracked onto the street by the end of the day in which the track-out occurs.</i> • <i>Restrict vehicle use to properly designated exit points.</i> • <i>Include additional BMPs that remove sediment prior to exit when minimum dimensions cannot be met.</i> <i>See Stabilized Construction Entrance/Exit Section SC-11 for additional requirements.</i>	<i>See Stabilized Construction Entrance/Exit Section SC-11</i>
<i>Irrigation Water</i>	• <i>Consider irrigation requirements.</i> • <i>Where possible, avoid species which require irrigation.</i> • <i>Design, timing and application methods of irrigation water to eliminate the runoff of excess irrigation water into the storm water drainage system.</i> <i>See Seeding and Planting Section EC-12 and California Stormwater BMP Handbook SD-12 Efficient Irrigation included in SWPPP Attachment A for additional requirements.</i>	<i>See Seeding and Planting Section EC-12 and California Stormwater BMP Handbook SD-12 Efficient Irrigation</i>
<i>Hydrotesting Effluent</i>	• <i>If work includes removing, relocation or installing waterlines, and Contractor elects to flush waterline or discharge hydrotesting effluent into State waters or drainage systems, the Contractor shall prepare and obtain HDOT acceptance of a NOI/NPDES Permit Form F application for HDOT submittal to DOH CWB at least 30 calendar days prior to the start of Hydrotesting Activities if necessary. Site specific BMPs will be included in the NOI/NPDES Permit Form F submittal.</i>	<i>Site specific BMPs will be included in the NOI/NPDES Permit Form F submittal.</i>

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
<i>Dewatering Effluent</i>	<i>If excavation or backfilling operations require dewatering, and Contractor elects to discharge dewatering effluent into State waters or existing drainage systems, Contractor shall prepare and obtain HDOT acceptance of a NOI/NPDES Permit Form G application for HDOT submittal to DOH CWB at least 30 calendar days prior to the start of Dewatering Activities if necessary. See Site Planning and General Practices, Dewatering Operations Section SM-18 for additional requirements.</i>	<i>See Dewatering Operations SM-18. Site specific BMPs will be included in the NOI/NPDES Permit Form G submittal.</i>
<i>Saw-cutting Slurry</i>	• <i>Saw cut slurry shall be removed from the site by vacuuming.</i> • <i>Provide storm drain protection during saw cutting. See Paving Operations Section SM-20 for additional requirements.</i> <i>Provide Storm Drain Inlet Protection and/or Perimeter Sediment Controls as applicable.</i>	<i>See Paving Operations Section SM-20, Storm Drain Inlet Protection SC-1, Perimeter sediment controls where applicable</i>
<i>Concrete Curing Water</i>	• <i>Avoid overspraying of curing compounds.</i> • <i>Apply an amount of compound that covers the surface, but does not allow any runoff of the compound.</i> <i>See California Stormwater BMP Handbook NS-12 Concrete Curing included in SWPPP Attachment A for additional requirements.</i>	<i>See California Stormwater BMP Handbook NS-12 Concrete Curing</i>

Pollutant Source	Appropriate Site-Specific BMP to be Implemented	BMP Requirements
Plaster Waste Water	• Direct all washwater into a leak-proof container or leak-proof pit. The container or pit must be designed so that no overflows can occur due to inadequate sizing or precipitation. • Locate on-site wash area a minimum of 50 feet away or as far as practicable from storm drain inlets, open drainage facilities, or water bodies. • Any significant residual materials remaining on the ground after the completion of construction shall be removed and properly disposed. If the residual materials contaminate the soil, then the contaminated soil shall also be removed and properly disposed of. • Plaster waste water shall not be allowed to flow into drainage structures or State waters. See Material, Storage and Handling Use SM-2, Stockpile Management Use Section SM-3, and Hazardous Materials and Waste Management Section SM-9 for additional requirements.	See Material, Storage and Handling Use Section SM-2, Stockpile Management Use Section SM-3, and Hazardous Materials and Waste Management Section SM-9
Water-Jet Wash Water	• For Water-Jet Wash Water used to clean vehicles, use off site wash racks or commercial washing facilities when practical. • See Vehicle and Equipment Cleaning Section SM-11 for additional information. • For Water-Jet Wash Water used to clean impervious surfaces, the runoff shall not be allowed to flow into drainage structures or State Waters.	See Vehicle and Equipment Cleaning Section SM-11
Sanitary/Septic Waste	• Locate Sanitary facilities in a convenient place away from drainage facilities. • Position sanitary facilities so they are secure and will not be tipped over or knocked down. • Wastewater shall not be discharged to the ground or buried. • A licensed service provider shall maintain sanitary/septic facilities in good working order. • Schedule regular waste collection by a licensed transporter. • See Sanitary Waste Section SM-7 for additional requirements.	See Sanitary Waste Section SM-7.

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END OF SECTION 209

NH-064-1(010)R
209-28a

1-14-22

1 **SECTION 301 – HOT MIX ASPHALT BASE COURSE**

2
3 Make the following amendments to said Sections:

4
5 **(I) Amend Section 301.03(B) Compaction** by revising the second
6 paragraph from lines 84 to 87 to read as follows:

7
8 “Compact mixture immediately upon completion of spreading
9 operations to density of not less than 92.0 percent of maximum theoretical
10 specific gravity in accordance with AASHTO T 209, modified by deletion of
11 Supplemental Procedure for Mixtures Containing Porous Aggregate.”

12
13
14 **(II) Amend Section 301.04 Measurement** from lines 98 to 100 to read as
15 follows:

16
17 **“301.04 Measurement.**

18
19 **(A)** The Engineer will measure Asphalt Concrete Base course per ton
20 in accordance with contract documents.”

21
22
23 **(III) Amend Section 301.05 Payment,** from lines 102 to 111 to read as
24 follows:

25
26 **“301.05 Payment.** The Engineer will pay for the accepted pay items
27 listed below at the contract price per pay unit, as shown in the proposal schedule.
28 Payment will be full compensation for the work prescribed in this section and the
29 contract documents.

30
31 The Engineer will pay for one of the following pay items when included in
32 the proposal schedule:

33

Pay Item	Pay Unit
(A) Asphalt Concrete Base, 10” Thick	Ton
(1) 80% of the contract unit price upon completion of submitting a job-mix formula acceptable to the Engineer; preparing the surface, spreading, and finishing the mixture; and compacting the mixture by rolling;	
(2) 20% of the contract unit price upon completion of cutting samples from the compacted pavement for testing; placing and compacting the sampled area with new material conforming to the surrounding area; protecting the pavement; and final analysis.	

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The Engineer may, in lieu of requiring removal and replacement, use the sliding scale factor to accept Asphalt Concrete Base compacted below 92.0 percent. The Engineer will make payment for the material in that production day at a reduced price arrived at by multiplying the contract unit price by the pay factor shown in Table 301.05-1.

Table 301.05-1 – Sliding Scale Pay Factor	
Percent Compaction	Percent Payment
92.0 or greater	100
90.0 – 91.9	80
<90.0	Removal

END OF SECTION 301

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(I) Amend 304.04 – Measurement by revising lines 54 to 55 to read as follows:

(A) The Engineer will measure aggregate base per cubic yard in accordance with the contract documents.

(B) Aggregate base course will be considered incidental to the Concrete Structures Installation. Measurement for payment will not apply.”

“304.05 Payment. The Engineer will pay for the accepted aggregate base at the contract price per pay unit, as shown in the proposal schedule. Payment will be full compensation for the work prescribed in this section and the contract documents. Aggregate base course shall not be paid separately but shall be considered incidental to the concrete structures installation, in the Proposal Schedule.

Pay Item	Pay Unit
Aggregate Base Course	Cubic Yard"

NH-064-1(010)R
304-1a

6/30/25

Amend Section 401- HOT MIX ASPHALT (HMA) PAVEMENT to read as follows:

“SECTION 401 – HOT MIX ASPHALT (HMA) PAVEMENT

401.01 Description. This section describes furnishing and placing dense graded HMA pavement (herein referred to as HMA) on a prepared surface.

401.02 Materials.

Asphalt Cement (PG 64-16) 702.01(A)

Use for non-surface mixes, unless otherwise specified in the project documents.

Asphalt Cement (PG 64E-22) 702.01(B)

Use for all surface mixes, except for on Lanai and Molokai, and unless otherwise specified in the project documents. Polymer modified asphalt (PMA) pavement refers to asphalt mix using PG 64E-22, unless otherwise indicated.

Emulsified Asphalt 702.04

Warm Mix Asphalt Additive 702.06

Aggregate for Hot Mix Asphalt Pavement 703.09

Filler 703.15

Hydrated Lime or a liquid anti-strip approved by the engineer 712.03

(A) General. HMA pavement shall be plant mixed and shall include mixture of aggregate and asphalt binder and may include reclaimed asphalt pavement (RAP) or filler, or both.

The manufacture of HMA may include warm mix asphalt (WMA) processes in accordance with these specifications. WMA processes include combinations of organic additives, chemical additives, and foaming.

HMA pavement shall include surface course and may include one or more binder courses, depending on HMA pavement thickness indicated in the contract documents.

RAP is defined as removed or reprocessed pavement materials containing asphalt and aggregates. Process RAP by crushing until 100 percent of RAP passes 3/4-inch sieve. Size, grade uniformly, and combine materials such that blend of RAP and aggregate material conforms to grading requirements of Subsection 703.09 - Aggregate for Hot Mix Asphalt

Pavement.

In surface and binder courses, aggregate for HMA may include RAP quantities up to 20 percent of total mix weight.

Quantity of filler material to correct deficiencies in aggregate gradation passing the No. 200 sieve shall not exceed 3 percent by weight of fine aggregates.

(B) Job-Mix Formula and Tests. Design job-mix formula in accordance with procedures contained in current edition of Asphalt Institute's *Mix Design Methods for Asphalt Concrete and Other Hot Mix Types*, Manual Series No. 2 (MS-2) for either Marshall Method or Hveem Method of Mix Design.

Limit compacted lift thickness and asphalt content of job-mix formula as specified in Table 401.02-1 - Limits of Compacted Lift Thickness and Asphalt Content.

TABLE 401.02-1 - LIMITS OF COMPACTED LIFT THICKNESS AND ASPHALT CONTENT				
MIX NO.	II	III	IV	V
Minimum to Maximum Compacted Thickness for Individual Lifts (Inches)	2-1/4 to 3	2 to 3	1-1/2 to 3	1-1/4 to 3
Asphalt Content Limits (Percent of Total Weight of Mix)	3.8 to 6.1	4.3 to 6.1	4.3 to 6.5	4.8 to 7.0

Asphalt content limits for porous aggregate may be exceeded only if it is requested ahead of placement and is reviewed then accepted in writing by the Engineer.

Meet job-mix formula design criteria specified in Table 401.02-2 - Job-Mix Formula Design Criteria.

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TABLE 401.02-2 - JOB-MIX FORMULA DESIGN CRITERIA	
Hveem Method Mix Criteria (AASHTO T 246 and AASHTO T 247)	
Stability, minimum	37
Air Voids (percent) ¹	3 - 5
Marshall Method Mix Criteria (AASHTO T 245)	
Compaction (number of blows each end of specimen)	75
Stability, minimum (pounds)	1,800
Flow (x 0.01 inch)	8 - 16
Air Voids (percent) ¹	3 - 5
Notes: 1. Air Voids: AASHTO T 166 or AASHTO T 275; AASHTO T 209, AASHTO T 269.	

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Minimum percent voids in mineral aggregates (VMA) of job-mix formula shall be as specified in Table 401.02-3 - Minimum Percent Voids in Mineral Aggregates (VMA).

TABLE 401.02-3 - MINIMUM PERCENT VOIDS IN MINERAL AGGREGATES (VMA)					
Nominal Maximum Particle Size, (Inches)	1-1/2	1	3/4	1/2	3/8
VMA, (percent) ¹	11.0	12.0	13.0	14.0	15.0
Notes: 1. VMA: See Asphalt Institute Manual MS-2					

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(C) Submittals. Establish and submit job-mix formula for each type of HMA pavement mix indicated in the contract documents a minimum of 30 days before paving production. Job mix shall include the following applicable information:

- (1) Design percent of aggregate passing each required sieve size.
- (2) Design percent of asphalt binder material (type determined by type of mix) added to the aggregate (expressed as % by weight of total mix),
- (3) Design proportion of processed RAP.
- (4) Design temperature of mixture at point of discharge at paver.

(5) Source of aggregate.

(6) Grade of asphalt binder.

(7) Test data used to develop job-mix formula.

Except for item (4) in this subsection, if design requirements are modified after the Engineer accepts job-mix formula, submit new job-mix formula before using HMA produced from modified mix design. Submit any changes to the design temperature of mixture at point of discharge for acceptance by the Engineer.

Submit a certificate of compliance for the asphalt binder, accompanied by substantiating test data from a certified testing laboratory.

(D) Range of Tolerances for HMA. Provide HMA within allowable tolerances of accepted job mix formula as specified in Table 401.02-4 - Range of Tolerances HMA. These tolerances are not to be used for the design of the job mix, they are solely to be used during the testing of the production field sample of the HMA mix.

TABLE 401.02-4 - RANGE OF TOLERANCES HMA	
Passing No. 4 and larger sieves (percent)	± 7.0
Passing No. 8 to No. 100 sieves (inclusive) (percent)	± 4.0
Passing No. 200 sieve (percent)	± 3.0
Asphalt Content (percent)	± 0.4
Mixture Temperature (degrees F)	± 20

The tolerances shown are the allowable variance between the physical characteristics of laboratory job mix submitted mix design and the production or operational mix, i.e., field samples.

401.03 Construction.

(A) Weather Limitations. Placement of HMA shall not be allowed under the following conditions:

(1) On wet surfaces, e.g., surface with ponding or running water, surface that has aggregate or surface that appears beyond surface saturated dry, as determined by the Engineer.

(2) When air temperature is below 50 degrees F and falling. HMA may be applied when air temperature is above 40 degrees F and rising. Air temperature will be measured in shade and away from artificial heat.

(3) When weather conditions prevent proper method of construction.

(B) Equipment.

(1) **Mixing Plant.** Use mixing plants that conform to AASHTO M 156, supplemented as follows:

(a) All Plants.

1. **Automated Controls.** Control proportioning, mixing, and mix discharging automatically. When RAP is incorporated into mixture, provide positive controls for proportioning processed RAP.

2. **Dust Collector.** AASHTO M 156, Requirements for All Plants, Emission Controls is amended as follows:

Equip plant with dust collector. Dispose of collected material. In the case of baghouse dust collectors, dispose of collected material or return collected material uniformly.

3. **Modifications for Processing RAP.** When RAP is incorporated into mixture, modify mixing plant in accordance with plant manufacturer's recommendations to process RAP.

(b) Drum Dryer-Mixer Plants.

1. **Bins.** Provide separate bin in cold aggregate feeder for each individual aggregate stockpile in mix. Use bins of sufficient size to keep plant in continuous operation and of proper design to prevent overflow of material from one bin to another.

2. Stockpiling Procedures. Separate aggregate for Mix II, Mix III and Mix IV into at least three stockpiles with different gradations as follows: coarse, intermediate, and fine. Separate aggregates for Mix V into at least two stockpiles. Stockpile RAP separately from virgin aggregates.

3. Checking Aggregate Stockpile. Check condition of the aggregate stockpile often enough to ensure that the aggregate is in optimal condition.

(c) Batch and Continuous Mix Plants.

1. Hot Aggregate Bin. Provide bin with three or more separate compartments for storage of screened aggregate fractions to be combined for mix. Make partitions between compartments tight and of sufficient height to prevent spillage of aggregate from one compartment into another.

2. Load Cells. Calibrated load cells may be used in batch plants instead of scales.

(2) Hauling Equipment. Use trucks that have tight, clean, smooth metal beds for hauling HMA.

Thinly coat truck beds with a minimum quantity of non-stripping release agent to prevent mixture from adhering to beds. Diesel or petroleum-based liquid release agents, except for paraffin oil, shall not be used. Drain excess release agent from truck bed before loading with HMA.

Provide a designated clean up area for the haul trucks.

Equip each truck with a tarpaulin conforming to the following:

(a) In good condition, without tears and holes.

(b) Large enough to be stretched tightly over truck bed, completely covering mix. The tarpaulin shall be secured in such a manner that it remains stretched tightly over truck bed and HMA mix until the bed is about to be raised up in preparation for discharge.

(3) Asphalt Pavers. Use asphalt pavers that are:

- (a) Self-contained, power-propelled units.
- (b) Equipped with activated screed or strike-off assembly, heated if necessary.
- (c) Capable of spreading and finishing courses of HMA mixtures in lane widths applicable to typical section and thicknesses indicated in the contract documents.
- (d) Equipped with receiving hopper having sufficient capacity for uniform spreading operation.
- (e) Equipped with automatic feed controls to maintain uniform depth of material ahead of screed.
- (f) Equipped with automatic screed controls with sensors capable of sensing grade from outside reference line, sensing transverse slope of screed, and providing automatic signals to control screed grade and transverse slope.
- (g) Capable of operating at constant forward speeds consistent with satisfactory laying of mixture.
- (h) Equipped with a means of preventing the segregation of the coarse aggregate particles from the remainder of the bituminous plant mix when that mix is carried from the paver hopper back to the paver augers. The means and methods used shall be approved by the paver manufacturer and may consist of chain curtains, deflector plates, or other such devices and any combination of these.

The following specific requirements shall apply to the identified bituminous pavers:

1. **Blaw-Knox Bituminous Pavers.** Blaw-Knox bituminous pavers shall be equipped with the Blaw-Knox Materials Management Kit (MMK).
2. **Cedarapids Bituminous Pavers.** Cedarapids bituminous pavers shall be those that were manufactured in 1989 or later.

259 **3. Barber-Green/Caterpillar Bituminous Pavers.**

260 Barber-Green/Caterpillar bituminous pavers
261 shall be equipped with deflector plates as
262 identified in the December 2000 Service
263 Magazine entitled "New Asphalt Deflector Kit
264 {6630, 6631, 6640}".

265
266 Bituminous pavers not listed above shall have similar
267 attachments or designs that shall make them equivalent to the
268 bituminous pavers listed above. The Engineer will solely
269 decide if it is equal to or better than the setups described for the
270 equipment listed above.

271
272 Submit for review and acceptance, prior to the start of
273 using the paver for the placing of plant mix, a full description in
274 writing of the means and methods that will be used to prevent
275 the bituminous paver from having both aggregate and
276 temperature segregation. Use of any paver that has not been
277 accepted is prohibited until acceptance of the paver is received
278 from the Engineer. Any pavement placed with an unaccepted
279 paver will be regarded as not compliant work and may not be
280 paid for and may require removal.

281
282 Supply a Certificate of Compliance that verifies that the
283 manufacturer's approved means and methods used to prevent
284 bituminous paver from having both aggregate and temperature
285 segregation have been implemented on all pavers used on the
286 project and are working in accordance with the manufacturer's
287 requirements and Contract Documents.

288
289 **(4) Rollers.** Rollers shall be self-propelled, steel-tired tandem,
290 pneumatic-tired, or vibratory-type rollers capable of reversing without
291 shoving or tearing the just placed HMA mixture. Provide sufficient
292 number, sequencing, type, and rollers of sufficient weight to compact
293 the mixture to required density while mixture is still in workable
294 condition. Equipment shall not excessively crush aggregate. Operate
295 rollers in accordance with manufacturer's recommendations and
296 Contract Documents. The use of intelligent compaction is encouraged
297 and may be required elsewhere in the Contract Documents.

298
299 **(a) Steel-Tired Tandem Rollers.** Steel-tired tandem rollers
300 used for initial breakdown or intermediate roller passes shall
301 have minimum gross weight of 12 tons and shall provide
302 minimum 250-pound weight per linear inch of width on drive
303 wheel.

304 Steel-tired tandem rollers used for finish roller passes

shall have minimum total gross weight of 3 tons.

Do not use roller with grooved or pitted rolling drum or worn scrapers or wetting pads. Replace excessively worn scrapers and wetting pads before use.

(b) Pneumatic-Tired Rollers. Pneumatic-tired rollers shall be oscillating-type, equipped with smooth-tread pneumatic tires of equal size and diameter. Maintain tire pressure within 5 pounds per square inch of designated operational pressure when hot. Space tires so that gaps between adjacent tires are covered by following set of tires.

Pneumatic-tired rollers used for breakdown or intermediate roller passes shall have a ballast capable of establishing an operating weight per tire of not less than 3,000 pounds. Equip rollers with tires having minimum 20-inch wheel diameter with tires inflated to 70 to 75 pounds per square inch pressure when cold and 90 pounds per square inch when hot. Equip rollers with skirt-type devices to maintain temperature of tires during rolling operations.

Pneumatic-tired rollers used for kneading finished asphalt surfaces shall have a ballast capable of establishing an operating weight per tire of not less than 1,500 pounds. Equip rollers with tires having minimum 15-inch wheel diameter with tires inflated to 50 to 60 pounds per square inch pressure. If required, equip rollers with skirt-type devices to maintain temperature of tires during rolling operations.

(c) Vibratory Rollers. Vibratory rollers shall be steel-tired tandem rollers having minimum total weight of 3 tons. Equip vibratory rollers with amplitude and frequency controls and speedometer. Operate vibratory roller in accordance with manufacturer's recommendations. For very thin lifts, 1 inch or less in thickness, vibratory rollers shall not be used in the vibratory mode. Instead, operate the unit in the static mode.

(5) Hand Tools. Keep hand tools used in production, hauling, and placement of HMA clean and free of contaminants. Diesel or mineral spirits or other cleaning material that is potentially deleterious to HMA may be used to clean hand tools providing:

- (a)** It does not contaminate HMA with cleaning material.
- (b)** Clean hand tools over catch pan with capacity to hold all

the cleaning material.

(c) Remove all diesel or mineral spirits or other cleaning material that is potentially deleterious to HMA from hand tools before using with HMA.

(d) Hand tools used shall be in a condition such that it meets the requirements that it was manufactured for, e.g., a straightedge shall meet the straightness requirement of the manufacturer.

(6) Material Transfer Vehicle (MTV).

(a) **Usage.** MTV usage applies to surface courses of paving projects on all Islands except Lanai, unless otherwise indicated. When placing HMA surface course use MTV to independently deliver mixtures from hauling equipment to paving equipment. MTV usage will not be required for the following:

1. Projects with less than 1,000 tons of HMA.
2. Temporary pavements.
3. Bridge deck approaches.
4. Shoulders.
5. Tapers.
6. Turning lanes.
7. Driveways.
8. Areas with low overhead clearances.

(b) **Equipment.** When using MTV, install minimum 10-ton-capacity hopper insert in conventional paver hopper. Provide the following equipment:

1. High-capacity truck unloading system in MTV capable of receiving HMA from hauling equipment.
2. MTV storage bin with minimum 15-ton capacity.
3. An auger mixing system in one of the following: the MTV storage bin, or paver hopper insert, or paver

hopper to continuously mix HMA prior to discharging to the paver's conveyor system.

Avoid stop-and-go operations by coordinating plant production rate, number of haul units, and MTV and paver speeds to provide a continuous, uniform, segregation-free material flow and smooth HMA pavement. Maintain uniform paver speed to produce smooth pavements.

(c) Performance Evaluation. Evaluate the performance of MTV and mixing equipment by measuring mat temperature profile immediately behind paver screed on first day of paving and when it feels the need to do so due to perceived changes in performance or as directed by the Engineer.

Use a hand-held temperature device that has been calibrated within the past 12 months. It shall be an infrared temperature gun is capable of measuring in one degree or finer increments between the temperatures of 80 degrees to 400 degrees F with a laser to indicate where the temperature reading is being taken. Six temperature profile measurements shall be taken of mat surface using infrared temperature gun at 50-foot intervals behind paver. Each temperature profile shall consist of three surface temperature measurements taken transversely across the mat in approximately a straight line from screed while paver is operating. For each profile, temperatures shall be measured approximately 1 foot from each edge and in middle of mat. The difference between maximum and minimum temperature measurements for each temperature profile shall not exceed 10 degrees F. If any two or more temperature profiles exceeds the allowable 10-degree F temperature differential, halt paving operation and adjust MTV or mixing equipment to ensure that material placed by paver meets specified temperature requirements. Redo the measuring of mat temperature profile until adjustment of the MTV or mixing equipment is adequate. Submit all temperature profiles to the Engineer by next business day. Information on the report shall show location and temperature readings and time test was performed. Enough information shall be given, so the Engineer will be able to easily locate the test site of the individual measurement.

When requested temperature profile measurements shall be done in the presence of the Engineer.

Once adjustments are made, repeat measurement procedure for the next two placements to verify that material

placed by paver meets specified temperature requirements. Terminate paving if temperature profile requirements are not met during repeated measurement procedure. If equipment fails to meet requirements after measurement procedure is repeated once, replace equipment before conducting any further temperature profile measurements

The Engineer may perform surface temperature profile measurements at any time during project. The Engineer may in lieu of a hand-held infrared temperature device use an infrared camera or device that is capable of measuring temperatures to locate cold spots. If such cold spots exist, the Engineer may require adjustments to the MTV.

If bleeding or fat spots occur in the pavement adjust means and methods to eliminate such pavement defects and perform remedial repair to pavement acceptable to the Engineer. Bleeding is defined as excess binder occurring on the surface of the pavement. It may create a shiny, glass-like, reflective appearance and may be tacky to the touch. Fat spots are localized bleeding.

(d) Transport.

1. Trailered MTV. Transport MTV by means of truck-tractor/trailer combination in accordance with Chapter 104 of Title 19, Department of Transportation, entitled "The Movement by Permit of Oversize and Overweight Vehicles on State Highways".

2. Crossing Bridges for Self-Powered MTV. When self-powered MTV exceeds legal axle or total weight limits for vehicles under the HRS, Chapter 291, conform to the following when crossing bridges within project limits unless otherwise indicated in the Contract Documents:

- a. Completely remove mix from MTV.
- b. Move MTV at relatively constant speed not exceeding 5 miles per hour. MTV will not be allowed to stop on bridge.

c. No other vehicle or equipment will be allowed on bridge.

d. The MTV shall not attempt to cross a bridge where the posted load limit is less than or equal to the weight of the MTV empty. Permission to cross the bridge shall be obtained from the Engineer and HWY-DB in writing.

(C) Preparation of Surface. Clean existing pavement in accordance with Section 310 - Brooming Off. Apply tack coat in accordance with Section 407 - Tack Coat. Tack coat shall not be applied to surfaces to receive an application of joint adhesive.

Where indicated in the Contract Documents, bring irregular surfaces to uniform grade and cross section by furnishing and placing one or more leveling courses of HMA Mix V. Spread leveling course in variable thicknesses to eliminate irregularities in existing surface. Place leveling course such that maximum depth of each course, when thoroughly compacted, does not exceed 3 inches.

In multiple-lift leveling course construction, spread subsequent lifts beyond edges of previously spread lifts in accordance with procedures contained in current edition of the Asphalt Institute's *Construction of Hot Mix Asphalt Pavements*, Manual Series No. 22 (MS-22) for leveling wedges.

Notify the Engineer of existing surfaces that may not be in a condition that will have enough strength to be a good bonding surface or foundation and should be removed or have remedial repairs done before new pavement placement.

(D) Plant Operation.

(1) Preparation of Asphalt Binder. Uniformly heat asphalt binder and provide continuous supply of heated asphalt cement from storage to mixer. Do not heat asphalt binder above the recommendation of the supplier for modified binders or above 350 degrees F for neat binders.

(2) Preparation of Aggregate. Dry and heat aggregate material at temperature sufficient to produce design temperature of job-mix formula. Do not exceed 350 degrees F. Adjust heat source used for drying and heating to avoid damage to and contamination of aggregate. When dry, aggregate shall not contain more than 1 percent moisture by weight.

For batch plants, screen aggregates immediately after heating

and drying into three or more fractions. Convey aggregates into separate compartments ready for batching and mixing with asphalt binder.

(3) Mixing. Measure aggregate and asphalt; or aggregate, RAP, and asphalt into mixer in accordance with an accepted job-mix formula. Mix until components are completely mixed and adequately coated with asphalt binder in accordance with AASHTO M 156. Percent of coated particles shall be 95 percent when tested in accordance with AASHTO T 195.

(4) Plant Inspection. For control and acceptance testing during periods of production, provide a testing laboratory that meets the requirements of AASHTO M 156. Provide space, utilities, and equipment required for performing specified tests.

(E) Spreading and Finishing. Prior to each day's paving operation, check screed or strike-off assembly surface with straight edge to ensure straight alignment and there is no damage or wear to the machine that will affect performance. Provide screed or strike-off assembly that produces finished surface without tearing, shoving, and gouging HMA. Discontinue using spreading equipment that leaves ridges, indentations, or other marks, or combination thereof in surface that cannot be eliminated by rolling or affects the final smoothness of the pavement or be prevented by adjustment in operation.

Maintain HMA at minimum 250 degrees F temperature at discharge to paver. The Engineer shall observe the contractor measuring the temperature of mix in hauling vehicle just before depositing into spreader or paver or MTV.

Deposit HMA in a manner that minimizes segregation. Raise truck beds with tailgates closed before discharging HMA.

Lay, spread, and strike off HMA upon prepared surface. Where practical, use asphalt pavers to distribute mixture.

Where practical, control horizontal alignment using automatic grade and slope controls from reference line, slope control device. Existing pavements or features shall not be used for grade control alone.

Obtain sensor grade reference, horizontal alignment by using established grade and slope controls. For subsequent passes, substitution of one ski with joint-matching shoe riding on finished adjacent pavement is acceptable. Use of a comparable non-contact mobile reference system and joint matching shoe is acceptable.

Avoid stop-and-go operation. Maintain a constant forward speed of

paver during paving operation and minimize other methods that impact smoothness.

Offset longitudinal joint in successive lifts by approximately 6 inches. Incorporate into paving method an overlap of material of 1-inch +/- 0.5 inches at the longitudinal joint. The HMA overlap material shall be left alone when initially placed and shall not be bumped back or pushed back with a lute or any other hand-held device. If the overlap exceeds the maximum amount, remove the excess with a flat shovel, allowing recommended amount of overlap HMA material to remain in place to be compacted. Do not throw the removed excess HMA material on to the paving mat. The longitudinal joint in a surface course when total roadway width is comprised of two lanes shall be near the centerline of pavement or near lane lines when roadway is more than two lanes in width. The longitudinal joint shall not be constructed in the wheel path or under the longitudinal lane lines. Make a paving plan drawing showing how the longitudinal joint will not be located in these areas.

Control the horizontal alignment of the longitudinal edge of the HMA mat being installed so that the edge is parallel to the centerline or has a uniform alignment, e.g., the edge of the mat is straight line or uniform curve, no wavy edge, etc. to have a consistent amount of HMA material at the joint.

Check the compaction of the longitudinal joint during paving often enough to ensure that it will meet the compaction requirements.

If nuclear gauges and ground penetrating radar are used as the contractor's quality control method, they shall be properly calibrated and periodically checked by comparison to cores taken from the pavement. The use of sand as an aid in properly seating the gauge may also be considered for improving the accuracy of the gauge.

In areas where irregularities or unavoidable obstacles make use of mechanical spreading and finishing equipment impracticable, spread, rake, and lute mixture by hand tools. For such areas, deposit, spread evenly, and screed mixture to required compacted thickness.

Demonstrate competence of personnel operating grade and crown control device before placing surface courses. If automatic control system becomes inoperative during the day's work, the Engineer will permit the Contractor to finish day's work using manual controls. The Engineer may also allow additional HMA to be ordered and placed using manual controls if it will provide a safer work site for the public to travel through. Do not resume work until automatic control system is made operative. The Engineer may waive requirement for electronic screed control device when paving gores, shoulders, transitions, and miscellaneous reconstruction areas where the use of the devices is not practical.

When production of HMA can be maintained and when practicable, use pavers in echelon shall be used to place surface course in adjacent lanes.

At the end of each workday, HMA pavement that is open to traffic shall not extend beyond the panel of the adjacent new lane pavement by more than the distance normally placed in one workday. At end of each day's production, construct tapered transitions along all longitudinal and transverse pavement drop-offs; this shall apply to areas where existing pavement is to meet newly placed pavement. Use slopes of 6:1 for longitudinal taper transitions and 48:1 for transverse tapered transitions. Maximum drop-off height along the joints shall be 2 inches. Also, using a 48:1 slope provides a taper around any protruding object, e.g., manholes, drain boxes, survey monuments, inlets, etc., that may be above pavement surface when opened to the public. If the object is below the surface of the pavement then fill the depression until it is level with the surrounding pavement or raise depressed objects to the finish grade of the placed pavement. Remove and dispose of all transition tapers before placing adjoining panel or next layer of HMA. Notify traveling public of pavement drop-offs or raised objects with signs placed in every direction of traffic that may use and encounter pavement drop-offs or protruding objects or holes.

Use the same taper rates for areas where there is a difference in elevation due to construction work.

At end of each workweek, complete full width of the roadway's pavement, including shoulders, to same elevation with no drop-offs.

(F) Compaction. Immediately after spreading and striking off HMA and adjusting surface irregularities, uniformly compact mixture by rolling.

Initiate compaction at highest mix temperature allowing compaction without excessive horizontal movement. Temperature shall not be less than 220 degrees F.

Finish rolling using tandem roller while HMA temperature is at or above 175 degrees F.

On superelevated curves, begin rolling at lower edge and progress to higher edge by overlapping of longitudinal trips parallel to centerline.

If necessary, repair damage immediately using rakes and fresh mix. Do not displace line and grade of HMA edges during rolling.

Keep roller wheels properly moistened with water or water mixed with

small quantities of detergent. Use of excess liquid, diesel, and petroleum-based liquids will not be allowed on rollers.

Along forms, curbs, headers, walls and other places not accessible to rollers, compact mixture with hot hand tampers, smoothing irons, or mechanical tampers. On depressed areas, trench roller or cleated compression strips under roller may be used to transmit compression.

Before the start of compaction or during compaction or both remove pavement that is loose, broken, or contaminated, or combination thereof; pavement that shows an excess or deficiency in asphalt binder content; and pavement that is defective in any way. Replace with fresh HMA pavement of same type, and compact. Remove and replace defective pavement and compact at no increase in contract price or contract time.

Operate rollers at slow and uniform speed with no sudden stops. The drive wheels shall be nearest to the paver. Continue rolling to attain specified density and until roller marks are eliminated.

Rollers shall not be parked on the pavement placed that day or shift.

(1) HMA Pavement Courses One and a Half Inches Thick or Greater. Where HMA pavement compacted thickness indicated in the Contract Documents is 1-1/2 inches or greater, compact to not less than 93.0 percent nor greater than 97.0 percent of the maximum specific gravity determined in accordance with AASHTO T 209, modified by deletion of Supplemental Procedure for Mixtures Containing Porous Aggregate.

Place HMA pavement in individual lifts that are within minimum and maximum allowable compacted thickness for various types of mixture as specified in Table 401.02-1 - Limits of Compacted Lift Thickness and Asphalt Content.

(2) HMA Pavement Courses Less Than One and a Half Inches Thick. Where HMA pavement compacted thickness indicated in the contract documents is less than 1-1/2 inches, compaction to a specified density will not be required.

Use only non-vibratory, steel-tired, tandem roller. Roll entire surface with minimum of two roller passes. A roller pass is defined as one trip of the roller in one direction over any one spot.

For intermediate rolling, roll entire surface with minimum of four passes of roller.

Finish rolling using steel-tired, tandem roller. Continue rolling until entire surface has been compacted with minimum of three passes of roller, and roller marks have been eliminated.

Do not use rollers that will excessively crush aggregate.

(3) HMA Pavement Courses One and a Half Inches Thick or Greater In Special Areas Not Designated For Vehicular Traffic.

For areas such as bikeways that are not part of roadway and other areas not subjected to vehicular traffic, compact to not less than 90.0 percent of maximum specific gravity determined in accordance with AASHTO T 209, modified by deletion of Supplemental Procedure for Mixtures Containing Porous Aggregate. Increase asphalt content by at least 0.5 percent above that used for HMA pavements designed for vehicular traffic. Paved shoulders shall be compacted in the same manner as pavements designed for vehicular traffic.

(G) Joints, Trimming Edges and Utility Marking. At HMA pavement connections to existing pavements, make joints vertical to depth of new pavement. Saw cut existing pavement and cold plane in accordance with Section 415 - Cold Planing of Existing Pavement to depth equal to thickness of surface course or as indicated in the Contract Documents.

At HMA connections to previously placed lifts, form transverse joints by cutting back on previous run to expose full depth of course. Dispose of material trimmed from edges. Protect end of freshly laid mixture from rollers.

Before and after paving, identify and mark location of existing utility manholes, valves, and handholes on finished surface. Adjust existing frames and covers and valve boxes to final pavement finish grade in accordance with Section 604 - Manholes, Inlets and Catch Basins and Section 626 - Manholes and Valve Boxes for Water and Sewer Systems.

(1) Longitudinal joints. Submit for review the means and methods that will be used to install longitudinal joints at the required compaction and density. Compact longitudinal joints to be not less than 91.0 percent of the maximum specific gravity determined in accordance with AASHTO T 209, modified by deletion of Supplemental Procedure for Mixtures Containing Porous Aggregate. Verify the compaction of the longitudinal joints meets requirements by using non-destructive testing methods during paving and submit the results on the daily quality control test reports.

Test for compaction and density regardless of layer thickness. Compaction and density of the longitudinal joint shall be determined by using six-inch diameter cores. For longitudinal joints made using butt joints cores

shall be taken over the joint with half of the core being on each side of the joint. For longitudinal joints using notched wedge joints, center core over the center of the wedge so that 50 percent of the material is from the most recently paved material and the remaining 50 percent of the core is from the material used to pave the previous layer. One core shall be taken at a maximum frequency of every 1,500 lineal feet (LF) of the second side of the longitudinal joint and any fraction of that length for each day of paving with a minimum of one core taken for each longitudinal joint per day. Cores taken for the testing of the longitudinal joint may be used to determine pavement thickness.

When the longitudinal joints are found to have less than 91.0 percent of the maximum specific gravity, overband all longitudinal joints within the entire lot represented by the non-compliant core, PG binder seal coat, or other type of joint enrichment accepted by the Engineer. The overband shall not decrease the skid resistance of the pavement under any ambient weather condition. Submit overband material's catalog cuts, test results and application procedure for review and acceptance by the Engineer before use. Center the overband over the longitudinal joint. The overband shall be placed in a uniform width and horizontal alignment. The overband shall have no holidays or streaking in its placement. The width of the overband shall be based on how the longitudinal joint was constructed or as directed by the Engineer. If a butt joint is used, the overband width shall be a minimum of 12-inches. For notch wedge or wedge joints the overband width shall be the width of the wedge plus an additional six-inches minimum. Replace any pavement markings damaged or soiled by the overband remedial repair process.

For longitudinal joints that have a compaction of less than 89 percent of the maximum specific gravity; removal may be required by the Engineer instead of overbanding the non-compliant joint.

Persistent low compaction results may be cause to suspend work and remove non-conforming work. During the suspension of paving, revise means and methods used in constructing longitudinal joints and submit to the Engineer for review and acceptance. Suspension may occur when:

- (1) Two or more longitudinal joints tests fail to meet the minimum compaction
- (2) One sample reveals that the joint compaction is 89 percent or less.

(H) HMA Pavement Samples. Obtain test samples from compacted HMA pavement within 72 hours of lay down. Provide minimum 4-inch diameter cores consisting of undisturbed, full-depth portion of compacted mixture taken at locations designated by the Engineer in accordance with the "Sampling and Testing Guide for Acceptance and Verification" in Hawaii DOT Highways Division, *Quality Assurance Manual for Materials*, Appendix 3. Cores shall be taken in the presence of the Engineer. Turn cores over to Engineer immediately after cores have been taken.

For pavement samples for longitudinal joints provide 6-inch diameter cores minimum. For pavement samples for other than longitudinal joints 4-inch diameter cores minimum shall be taken. All cores shall consist of undisturbed, full-depth of the lift of the compacted mixture taken at locations designated by the Engineer in accordance with the "Sampling and Testing Guide for Acceptance and Verification" in Hawaii DOT Highways Division, *Quality Assurance Manual for Materials*, appendix 3.

Cores that separate shall indicate to the Engineer that there is insufficient bonding of layers. Modify the previously used paving means and methods to prevent future debonding of layers. Debonding of a core sample after adjustment of the Contractor's methods will be an indication of continued non-conforming work and the Engineer may direct removal of the layer at no additional cost or contract time.

Restore HMA pavement immediately after obtaining samples. Clean core hole and walls of all deleterious material that will prevent the complete filling of the core hole and the bonding of the new HMA to the existing. Apply tack coat to vertical faces of sample holes. Fill sampled area with new HMA pavement of same type as that removed. If hand compaction is used; fill in layers not exceeding the minimum thickness stated in Table 401.02-1 - Limits of Compacted Lift Thickness And Asphalt Content. Compact each layer to compaction requirements. If Mechanical Compaction methods are used, then layers may be the maximum layer thickness stated in Table 401.02-1 - Limits of Compacted Lift Thickness And Asphalt Content. Using tires or hand tamping to compact the HMA material to restore the pavement shall not be considered as mechanical compaction.

Only sample and test leveling course if 1-1/2 inches or greater. No compaction requirements for less than 1-1/2 inches.

(I) HMA Pavement Thickness Tolerances.

Thickness of finished HMA pavement shall be within 0.25 inch of thickness indicated in the Contract Documents. Pavement not meeting the thickness requirements of the Contract Documents may be required by the Engineer to be removed and replaced.

Corrective methods taken on pavement exceeding specified tolerances, e.g., insufficient thickness by methods accepted by the Engineer, including removal and replacement, shall be at no increase in contract price or contract time.

The checking of pavement thickness shall be done after all remedial repairs, e.g., smoothness compliance repairs, compaction, have been completed, reviewed, and accepted by the Engineer.

(J) Quality Control Using New Technology. The Engineer and MTRB reserves the right to utilize new technology and methods to improve the detection of noncompliant work on the project. The technology or method may be used to locate defects in the work, e.g., ground penetrating radar to locate delaminations, moisture damage, thin sections, voids, non-compliant compaction, other non-destructive testing to locate flaws. The defect will be verified by the methods stated in the Contract Documents or by other established conventional means. If the technology or method has already been accepted elsewhere or has standardized testing procedures the results may be judged acceptable by the Engineer and no further testing will be required. These new technologies and methods may be used for the selection of sampling locations.

(K) Protection of HMA Pavement. Except for construction equipment directly connected with paving operations, keep traffic off HMA pavement.

Protect HMA pavement from damage until it has cooled and set.

Do not refuel equipment or clean equipment or hand tools over paved surfaces unless catch pan or device that will contain spilled fuel and other products is provided. After completion of refueling or cleaning, remove catch pan or device without spilling any of the collected content.

Do not park roller or other paving equipment on HMA pavement paved within 24 hours of laydown.

(L) Pavement Joint Adhesive

(1) Pavement Joint Adhesive on Joints. Use on all asphalt pavement construction where joints are formed at such locations but not limited to the following:

(a) Adjacent asphalt pavements, e.g., trafficked lanes, shoulders, etc.

(b) Asphalt pavement and adjacent concrete pavement or

curb and gutter or any other surface where the bonding of the asphalt pavement and concrete surface is desired,

(c) Transverse joints between asphalt pavements not placed at the same time or if the pavement's temperature on one side of the joint is below the minimum temperature the mix can be at, during asphalt pavement compaction or installation.

(d) Cut face of an existing pavement where it will have new HMA pavement placed against it, e.g., utility trenches, partial or full depth repairs, etc.

Pavement joint adhesive is not required on a longitudinal construction joint between adjacent hot mix asphalt pavements formed by echelon paving. Echelon paving is defined as paving multiple lanes side-by-side with adjacent pavers slightly offset at the same time.

A longitudinal construction joint between one shift's work and another shall have pavement joint adhesive applied at the joint. Any longitudinal construction joint formed, with the temperature on one side of the joint that is below the minimum temperature the mix can be when compacted to contract requirements during asphalt pavement installation, shall have pavement joint adhesive applied at the joint.

(2) **Material requirements.** Asphalt joint adhesive shall meet requirements as specified in Table 401.03-1 - Asphalt Joint Adhesive Specifications.

TABLE 401.03-1 – ASPHALT JOINT ADHESIVE SPECIFICATIONS		
TEST		SPECIFICATION
Brookfield Viscosity, 204 °C [400 °F]	ASTM D 3236	4,000-10,000 cp
Cone Penetration, 25 °C [77 °F]	ASTM D 5329	60-100 dmm
Resilience, 25 °C [77 °F]	ASTM D 5329	30% minimum
Ductility, 25 °C [77 °F]	ASTM D 113	30 cm minimum
Ductility, 4 °C [39.2 °F]	ASTM D 113	30 cm minimum
Tensile Adhesion, 25 °C [77 °F]	ASTM D 5329	500% minimum
Softening Point	ASTM D 36	77 °C [170 °F] min.
Asphalt Compatibility	ASTM D 5329	Pass

(3) Construction Requirements for Asphalt Joint Adhesive

(a) **Equipment Requirements.** Use a jacketed double

boiler type melting unit, with both agitation and recirculation systems. Provide a pressure feed wand application system.

(b) Material Handling. Submit a copy of the manufacturer's recommendations for heating, re-heating, and applying the joint adhesive material. Follow manufacturer's recommendations. Do not remove the joint adhesive from the package until immediately before it is placed in the melter. Joint adhesive boxes must be clearly marked with the name of the manufacturer, the trade name of the adhesive, the manufacturer's batch and lot number, the application/pour temperature, and the safe heating temperature. Feed additional material into the melter at a rate equal to the rate of material used.

Verify the pouring temperature of the joint adhesive at least once per hour at the point of discharge. Stop production if the adhesive falls below the recommended application/pour temperature. When the temperature of the adhesive exceeds the maximum safe heating temperature, stop production, empty the melter, and dispose of that adhesive in an environmentally safe method. No payment will be made for this material or its disposal.

Do not blend or mix different manufacturer's brands or different types of adhesives.

(c) Joint Adhesive Application: The face of the joint that the new asphalt pavement will bind to shall be clean and dry before the joint adhesive is applied. Apply the pavement joint adhesive material to the entire face of the surface where HMA pavement shall be installed. The thickness of the asphalt adhesive application shall be approximately 1/8 inch. Use an application shoe attached to the end of application wand. Do not overlap the joint by greater than 1/2-inch at the top of the joint or two-inches at the bottom of the joint. Apply the joint adhesive immediately in front of the paving operation. If the adhesive is tracked by construction vehicles, repair the damaged area, and restrict traffic from driving on the adhesive.

(d) Field Sampling. Take a sample from the application wand during the first 20 minutes of placing sealant. One sample should be taken per manufacturer's batch or minimum of every 6 months on the Project in the presence of the Engineer.

Each sample shall consist of one quart in an aluminum or steel sample container. The sampling container shall be labeled with Contractor's name; project name and number; date and time sample taken; location of where material was used at, e.g., from where to where it was used at in stations; manufacturer and lot number of the sealant. Turn over samples to Engineer without Engineer losing sight of the sample. The Engineer reserves the right to conduct supplementary sampling and testing of the sealant material.

(M) Pavement Smoothness Rideability Test. Perform surface profile tests frequently to ensure that the means and methods being used produces pavement that is compliant with the surface profile smoothness requirement. Test the pavement surface for smoothness with High-Speed Inertial Profiler to determine the International Roughness Index (IRI) of the pavement. For the locations determined by the Engineer, a 10-foot straightedge shall be used to measure smoothness.

All smoothness testing must be performed with the presence of the Engineer. The High-Speed Inertial Profiler operator shall be a certified operator by MTRB or the manufacturer.

The High-Speed Inertial Profiler operator's certification shall be no older than five years old at the date of the Notice to Proceed and at the day of the pavement profile measurement.

The finished pavement shall comply to all the following requirements:

(a) Smoothness Test using 10-Foot Straightedge (Manual or rolling) The 10-foot straightedge is used to identify the locations that vary more than 3/16 inch from the lower edge when the 10-foot straightedge is laid on finished pavement on the direction parallel with the centerline or perpendicular to centerline. Remove the high points that cause the surface to exceed that 3/16 inch tolerance by grinding.

The Contractor shall use a 10-foot straightedge for the following locations:

1. Longitudinal profiling parallel to centerline, when within 15 feet of a bridge approach or existing pavement which is being joined.
2. Transverse profiling of cross slopes, approaches, and as otherwise directed. Lay the straightedge in a direction perpendicular to the centerline.

3. When pavement abuts bridge approaches or pavement not under this Contract, ensure that the longitudinal slope deviations of the finished pavement comply with Contract Document's requirements.

4. Short pavement sections up to 600 feet long, including both mainline and non-mainline sections on tangent sections and on horizontal curves with a centerline radius of curve less than 1,000 feet.

5. Within a superelevation transition on horizontal curves having centerline curve radius less than 1,000 feet, e.g., curves, turn lanes, ramps, tapers, and other non-mainline pavements.

6. Within 15 feet of transverse joint that separates pavement from existing pavement not constructed under the contract, or from bridge deck or approach slab for longitudinal profiling.

7. At miscellaneous areas of improvement where width is less than 11 feet, such as medians, gore areas, and shoulders.

8. As otherwise directed by the Engineer. The Engineer may confine the checking of through traffic lanes with the straightedge to joints and obvious irregularities or choose to use it at locations not specifically stated in this Section.

(b) High-Speed Inertial Profiler

There shall be a minimum 3 profile runs per lane, for each wheel path (left and right) which is approximately three feet from edge lane line. The segment length shall be 0.1 mi. The final segments in a lane that are less than 0.1 mi shall be evaluated as an independent segment and pay adjustments will be prorated for length. The profiles shall be taken in the direction of traffic only.

The latest version of FHWA ProVAL software shall be used to conduct profile analysis to determine IRI and areas of localized roughness. The IRI values shall be reported in units of in/mi.

Areas of localized roughness will be identified by using ProVAL's "Smoothness Assurance" analysis, calculating IRI with a continuous short interval of 25 feet and the 250-mm filter applied.

Additional runs may be required by the Engineer if the data indicate a lack of repeatability of results. A 92% agreement is required for repeatability and IRI values shall have at minimum a 95% confidence level.

(N) Required Pavement Smoothness

The IRI for the left and right wheel paths in an individual lane will be computed and then averaged to determine the Mean Roughness Index (MRI) values. The MRI will be used to determine acceptance and pay adjustment. Each lane shall be tested and evaluated separately.

There are three (3) categories of target MRI values as specified in Table 401.03-2 – Pavement Smoothness Categories:

TABLE 401.03-2 – PAVEMENT SMOOTHNESS CATEGORIES		
Category	Description	MRI
Type A	Three or more opportunities for improving ride	Shall not exceed 60 in/mi
Type B	Two opportunities for improving ride	Shall not exceed 70 in/mi
Type C	One opportunity for improving ride	Shall not exceed 75 in/mi

An opportunity for improving ride is considered as one (1) lift of asphalt pavement, including but not limited to HMAB, HMA, PMA, and SMA.

For the location where a 10-foot manual straightedge is required, the surface shall not vary more than 3/16 inch from the lower edge of a straightedge.

No pre-final inspection, final inspection, and substantial completion granted will be made until the pavement meets smoothness requirement and all required profile reports are submitted to the Engineer and MTRB and are accepted.

(O) Request for Profile Testing by the Department.

For Type C, prior to pavement activities, the Engineer will measure the smoothness of the existing pavement.

The Contractor shall submit a written request to the Engineer to perform all required profile tests.

The request shall be made at least 30 days before desired testing date and shall include an approximate acceptance profile testing date, a plan view drawing of the area to be tested with the limits of the test area highlighted.

The Contractor shall reimburse HDOT for any incurred cost related to any Contractor-caused cancellation or a deduction to the monthly payment will be made.

(P) Department Requirements for Profile Testing. When a request for testing is made, the requested area to be tested shall be 100% of the total area indicated to be paved in the Contract Documents unless the requirement is waived by the Engineer and MTRB.

Department acceptance surface tests will not be performed earlier than 14 days after HMA placement.

Clean debris and clear obstructions from area to be tested, as well as a minimum of 100 feet before and beyond the area to be tested before testing starts for use as staging areas. Provide traffic control for all profile testing.

The Engineer or MTRB or both may cancel the profile testing if the test area is not sufficiently clean, traffic control is unsatisfactory, or the area is not a safe work environment or test area does not meet Contract Document requirements. This canceled profile test will count as one profile test.

(Q) Cost of Acceptance Profile Testing by The Department. The Engineer, MTRB, or State's Third-Party Consultant will perform one initial profile test, at no cost to the Contractor for each area to be tested.

The Department's High-Speed Inertial Profiler pavement profile will be used to determine if the pavement's profile, i.e., smoothness is acceptable.

If the profile of the pavement does not meet the requirements of the Contract Documents, the Contractor shall perform remedial work, i.e. corrective work then retest the area to ensure that the area has the required MRI, i.e., smoothness, before requesting another profile test by the Engineer.

(1) Additional testing. Additional testing, by the Department beyond the initial test will be performed at cost to the Contractor as follows:

(a) \$2,500 per test will be required when Department personnel or State's Third-Party Consultant is used.

(R) Remedial Work for Pavements.

(1) Corrective work shall be required for any 25 ft interval with a localized roughness in excess of 160 in/ mi. The Engineer may waive localized roughness requirements for deficiencies resulting from

manholes or other similar appurtenances. Adjust manholes or other similar appurtenances so that using a 10-ft. straightedge the area around that manhole or other similar appurtenance shall not have more than 3/16-in. variation between any 2 contacts on the straightedge.

If corrective action is not successful, the Engineer may require continued corrective action, or apply a payment adjustment of \$250 per occurrence.

(2) Corrective work shall also be required for any 0.1 mile interval with an average MRI above 95.0 in/mi for Types A and B. For Type A, correct the deficient section to an MRI of 60 in/mi or less. For Type B, correct the deficient section to an MRI of 70 in/mi or less. For Type C, corrective work may be required by the Engineer for 0.1 mile intervals that have an average MRI above the threshold shown in Tables 401.03-4 Smoothness Pay Disincentives With MRI and 401.03-5 Smoothness Pay Disincentives For Percent Improvement as applicable.

If corrective action does not produce the required improvement, the Engineer may require continued corrective action, or apply payment adjustment as shown in Tables 401.03-4 Smoothness Pay Disincentives With MRI and 401.03-5 Smoothness Pay Disincentives For Percent Improvement.

(3) The Contractor shall notify the Engineer at least 24 hours prior to commencement of the corrective work. The Contractor shall not commence corrective work until the methods and procedure have been approved in writing by the Engineer.

(4) All smoothness corrective work for areas of localized roughness shall be for the entire lane width. Pavement cross slope shall be maintained through corrective areas.

(5) The remedial repair areas shall be neat, rectangular areas having a uniform surface appearance.

(6) If grinding is used on HMA pavement, the surface shall have nearly invisible grinding marks to passing motorist.

(7) Other methods may include milling and overlaying HMA pavement. The length, depth of the milling and the replacement material will be solely decided by the Engineer.

(8) The finished repaired pavement surface shall leave no ridges or valleys or fins of pavement other than those allowed below.

(9) Remedial repairs shall not leave any drainage structures' inlets higher than the surrounding pavement or alter the Contract Document's drainage pattern.

(10) For items in the pavement other than drainage structures, e.g., manhole frame and covers, survey monuments, expansion joints etc., the finish pavement, ground or not, shall not be more than 1/4 inch in elevation difference. Submit to the Engineer remedial repair method to correct these conditions for acceptance.

(11) Pick up immediately grinding operation residue by using a vacuum attached to grinding machine or other method acceptable to the Engineer.

(a) Any remaining residue shall be picked up before the end of shift or before the area is open to traffic, whichever is earlier.

(b) Prevent residue from flowing across pavement or from being left on pavement surface or both.

(c) Residue shall not be allowed to enter the drainage system.

(d) The residue shall not be allowed to dry or remain on the pavement.

(e) Dispose of all material that is the result of the remedial repair operation, e.g., HMA residue, wastewater, and dust at a legal facility.

(12) Complete corrective work before determining pavement thickness for HMA pavements in accordance with Subsection 401.03(I) – HMA Pavement Thickness Tolerances.

(13) All HMA wearing surface areas that have been ground shall receive a coating, e.g., a coating material that will restore any lost impermeability of the HMA due to the grinding of the surface. The coating used shall not be picked up or tracked by passing vehicles or be degraded after a short period of time has passed, i.e., it shall have a service life equal to or greater than the HMA pavement. The coating shall not decrease the pavement's friction value. The coating's limits shall be the full width of the lane regardless how small. If the remedial repair area extends into the next lane, then the repair area will be full

lane width also. Extend the length of coating areas in order for the coating area to look like the rest of the road and does not have patches on it, i.e., make the road look uniform in color. The coating shall be of a color that matches the surrounding pavement. The areas receiving the coating shall not be open to traffic until it has cured enough so that it cannot be picked up or tracked by passing vehicles or degrade. Submit means and methods of the coating and type of coating to the Engineer or MTRB for review and acceptance. Do not proceed with the coating without acceptance from the Engineer.

(14) Recompacting cold HMA, i.e., HMA that has reached ambient temperature is not an acceptable remedial repair method.

(15) Replace all pavement markings damaged or discolored by remedial repairs.

(16) Reprofile the corrected area and provide the Engineer the results that show the corrective action, i.e., remedial repairs were successful.

(S) Pavement Smoothness and Acceptance.

(1) Price and payment in various paving sections, e.g., 401 (Hot Mix Asphalt Pavement), shall be full compensation for all work and materials specified in the various paving sections and this section, including but not limited to furnishing all labor, materials, tools, equipment, testing, incidentals and for doing all work involved in micro milling, milling (cold planing), grinding existing or new pavement, removing residue, cleaning the pavement, necessary disposal of residue, furnishing of any water or air used in cleaning the pavement and any other related ancillary work or material or services. Also, it includes any remedial work, e.g., re-paving, surface grinding, application of a coating, curing compound, and replacement of damaged pavement markings.

(2) The contract price in those sections may be adjusted for pavement smoothness by the Engineer. The pavement smoothness contract unit price adjustments and work acceptance will be made in accordance with the following schedules.

TABLE 401.03-3 –SMOOTHNESS PAY INCENTIVES		
Category	MRI (in/mi)	Pay Adjustment \$ per 0.1 mi
Type A	<30.0	\$580
	30.0- less than 35.0	\$480
	35.0- less than 40.0	\$380
	40.0- less than 45.0	\$280
	45.0- less than 50.0	\$180
	50.0- less than 55.0	\$80
	55.0- less than 60.0	\$0
Type B	<35.0	\$420
	35.0- less than 40.0	\$360
	40.0- less than 45.0	\$300
	45.0- less than 50.0	\$240
	50.0- less than 55.0	\$180
	55.0- less than 60.0	\$120
	60.0- less than 65.0	\$60
	65.0- less than 70.0	\$0
Type C	<40.0	\$280
	40.0- less than 45.0	\$240
	45.0- less than 50.0	\$200
	50.0- less than 55.0	\$160
	55.0- less than 60.0	\$120
	60.0- less than 65.0	\$80
	65.0- less than 70.0	\$40
	70.0- less than 75.0	\$0

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(3) Pay Pavement Smoothness Adjustment will be based on the initial measured MRI for both left and right wheel path, prior to any corrective work for the 0.10-mile section, except for sections that the Contractor has chosen to remove and replace. For sections that are replaced, assessments will be based on the MRI determined after replacement.

(a) The Pavement Smoothness Adjustment will be computed using the plan surface area of pavement shown in the Contract Documents. This Pavement Smoothness Adjustment will apply to the total area of the 0.10-mile section for the lane width represented by MRI for the same lane. It does not include any other price adjustments specified in the Contract Documents. Those price adjustments will be, for each adjustment, calculated separately using the original contract price to determine the amount of adjustment to be made to the contract price. Sections shorter than 0.1 mile and longer than 50 feet shall be prorated.

(b) For 0.1 mile intervals with an average MRI above the threshold shown in Table 401.03-3 Smoothness Pay Incentives, the Engineer shall apply a disincentive payment adjustment up to the limit shown.

i. For Types A and B, payment adjustments shall be applied up to an MRI of 95.0 per Table 401.03-4 Smoothness Pay Disincentives with MRI.

ii. For Type C, the payment adjustment shall be dependent on the average MRI of the pavement prior to paving activities

1. If the MRI of the pavement prior to paving activities is 125.0 in/mi or less, the payment adjustment shall be per Table 401.03-4 Smoothness Pay Disincentives with MRI.

2. If the MRI of the pavement prior to paving activities is more than 125.0 in/mi, the disincentive payment adjustment shall be per Table 401.03-5 Smoothness Pay Disincentives For Percent Improvement, and based on the percent improvement using the following formula:

% Improvement = (Initial segment MRI – Final segment MRI) x 100 / (Initial Segment MRI)

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TABLE 401.03-4 –SMOOTHNESS PAY DISINCENTIVES WITH MRI		
Category	MRI (in/mi)	Pay Adjustment \$ per 0.1 mi
Type A	60.0- less than 70.0	-\$100
	70.0- less than 75.0	-\$250
	75.0- less than 80.0	-\$350
	80.0- less than 85.0	-\$450
	85.0- less than 95.0	-\$550
	> 95.0	Corrective Work
Type B	70.0- less than 75.0	-\$100
	75.0- less than 80.0	-\$200
	80.0- less than 85.0	-\$300
	85.0- less than 95.0	-\$400
	> 95.0	Corrective Work
Type C (pre-paving MRI < 125)	75.0- less than 80.0	-\$50
	80.0- less than 85.0	-\$100
	85.0- less than 90.0	-\$150
	90.0- less than 100.0	-\$200
	>100.0	-\$250

1330

TABLE 401.03-5 –SMOOTHNESS PAY DISINCENTIVES FOR PERCENT IMPROVEMENT		
Category	Percent Improvement %	Pay Adjustment \$ per 0.1 mi
Type C	≥ 40	\$0
(pre-paving MRI > 125)	20.0- less than 40.0	-\$100
	< 20	-\$200

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(c) Incentives will not apply to areas where payment deductions or remedial repairs has been made for non-compliant work, e.g., low compaction, thin pavement, thermal segregation, low compressive or flexural strength, non-compliant alignment. Incentives will also not apply to areas where corrective work was required to meet contract smoothness requirements, unless the pavement section was

401.05

replaced. All areas where corrective work was performed shall be tested again to ensure the smoothness requirements are met.

(d) There will be no incentive price adjustments to the contract prices regardless of the pavement meeting the Contract Documents' requirements for incentive contract price adjustment, when 25% of the total area paved of that particular type of pavement on the project has failed to meet any of the Contract document requirements, e.g., smoothness, thickness, unit weight, asphalt content, pavement defects, compaction, flexural or compressive strength. Areas exempt from the smoothness requirements may not be included in the total area calculation unless it is non-compliant.

(e) For contracts using lump sum the method described in Subsection 104.06 Methods of Price Adjustment paragraph (3), will be used to calculate proportionate unit price, i.e., the Engineer's calculated theoretical unit price. This calculated proportionate unit price will be used to calculate the unit price adjustment.

401.04 Measurement.

(A) The Engineer will measure HMA pavement per ton in accordance with the Contract Documents.

(B) The Engineer will measure HMA pavement overlay per ton in accordance with the Contract Documents.

(C) Engineer will measure additional State pavement profiling work when applicable on a cost-plus basis as specified in this section and as ordered by Engineer. The Engineer will issue a billing for the pavement profile work done for the time period with the invoices and receipts that the billing was based on attached to the Contractor for each contract item. The Contractor's pavement profile work required in this section will not be measured and will be considered incidental to the various paving items unless stated otherwise.

401.05 Payment. The Engineer will pay for the accepted HMA pavement at the contract price per pay unit, as shown in the proposal schedule. Payment will be full compensation for the work prescribed in this section and the contract documents.

(A) Price and payment in Section 401 – HMA Pavement will be full compensation for all work and materials specified in this Section including furnishing all labor, materials, tools, equipment, testing, pavement profiles and incidentals and for doing all work involved in grinding existing or new

pavement, removing residue, and cleaning the pavement, including necessary disposal of residue and furnishing any water or air used in cleaning the pavement and remedial work needed to conform to the requirements of the Contract Documents.

(B) No payment for the Contractor's pavement profile work required in this section will be made. The Contractor's pavement profile work shall be considered incidental to the various paving items unless stated otherwise.

(C) Engineer will pay or deduct for the following pay items when included in proposal schedule:

Pay Item	Pay Unit
Asphalt Overlay, Mix No. IV (2" Minimum, 4" Maximum)	Ton
PMA Pavement, Mix No. IV (w/ PG 64E-22)	Ton

(1) 70% of the contract unit price or the theoretical calculated unit price upon completion of submitting a job-mix formula acceptable to the Engineer; preparing the surface, spreading, and finishing the mixture; and compacting the mixture.

(2) 20% of the contract unit price or the theoretical calculated unit price upon completion of cutting samples from the compacted pavement for testing; placing and compacting the sampled area with new material conforming to the surrounding area; protecting the pavement; and compaction acceptance. Maintain temporary pavement markings and other temporary work zone items, maintain a clean work site.

(3) 10% of the contract unit price or calculate the unit price when the final configuration of the pavement markings is in place.

The Engineer will pay for adjusting existing frames and covers and valve boxes in accordance with and under Section 604 – Manholes, Inlets and Catch Basins. Adjustments for existing street survey monument frames and covers will be paid for as if each were a valve box frame and cover.

The Engineer may, at his sole discretion, use the sliding scale factor as specified in Table 401.05-1 – Sliding Scale Pay Factor for Compaction to accept HMA pavements compacted between 90.0 percent and 98.0 percent. If the sliding scale factor is used, the Engineer will make payment for the material in that production day at a reduced price by multiplying the contract unit price by the pay factor. The Engineer is not obligated to allow non-compliant work to remain in place

401.05

and may choose to require removal of the pavement that is less than 93.0 percent or greater than 97.0 percent.

Removal of non-compliant pavement shall be in accordance with Subsection 105.12 Removal of Non-Conforming and Unauthorized Work.

Table 401.05-1 – Sliding Scale Pay Factor for Compaction	
Percent Compaction	Percent of Quantity Paid
> 98.0	Removal
>97.0 - 98.0	95
93.0- 97.0	100
90.0 - <93.0	80
<90.0	Removal

END OF SECTION 401”

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(I) Amend **Subsection 411.03(I)(1) — General** by revising the first paragraph from line 205 to 210 to read:

(II) Amend **411.04 — Measurement** by revising lines 955 to 961 to read as follows:

(A) The Engineer will measure concrete pavement per cubic yard in accordance with the contract documents."

Pay Item	Pay Unit

The Engineer will not pay for longitudinal joints, transverse expansion joints, transverse contraction joints, or construction joints separately and will consider the cost for those items as included in the contract price for the concrete pavement pay item. The cost is for the work prescribed in this section, Section 411 — Portland Cement Concrete Pavement, and the contract documents."

NH-064-1(010)R
411-1a

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(I) Amend 503.04 – Measurement by revising lines 1201 to 1205 to read as follows:

(II) Amend **503.05 – Payment** by revising lines 1206 to 1223 to read as follows:

The contract lump sum amount paid shall be full compensation for the concrete; for limited excavation and placement of basecourse following section 304; for placing, curing and finishing; for furnishing materials including admixtures and cement (including extra cement added to concrete deposited under water); for furnishing and installing drains, scuppers, premolded joint fillers, joint seals, waterproofing at construction joints, waterstops, pipes and conduits; for furnishing and installing metal rockers, anchor bolts, structural shapes for expansion joints, utility covers and other similar items; for timber bumpers, forms, form lining and falsework or centering, bearing pads, structural steel bearing plates; and for equipment, tools, labor, materials and incidentals necessary to complete the work.

The Engineer will pay for the following pay item when included in the proposal schedule:

END OF SECTION 503

NH-064-1(010)R
503-1a

7/23/25

1 **SECTION 602 – Reinforcing Steel**
2

3 Make the following amendments to said Section:
4

5 **(I)** Amend **602.04 – Measurement** by revising lines 803 to 808 to read as
6 follows:
7

8 **“602.04 Measurement.** Reinforcing steel will be considered incidental to
9 the Concrete Structures installation. Measurement for payment will not apply.
10

11 **(II)** Amend **602.05 – Payment** by revising lines 810 to 830 to read as follows:
12

13 **“602.05 Payment.** Reinforcing steel shall not be paid separately but shall
14 be considered incidental to the concrete installation, in the Proposal Schedule.”
15
16
17
18

19 **END OF SECTION 602**

1 **SECTION 607 – CHAIN LINK FENCES AND GATES**

2
3 Make the following amendment to said Section:

4
5 **(I)** Amend **607.04 - Measurement** by replacing lines 105 to 106 to read:

6
7 **“607.04 Measurement.** The Engineer will measure fence by the linear foot.
8 Measurement will be along the top of the fence from outside to outside of end
9 post for each continuous run of fence.

10
11 The Engineer will measure gates per each as complete units of the size
12 and type specified in the proposal, complete in place.”

13
14 **(II)** Amend **607.05 – Payment** by revising lines 108 to 115 to read as follows:

15
16 **“607.05 Payment.** The Engineer will pay for the accepted quantities of
17 fence at the contract unit price per linear foot of the types and sizes specified in
18 the proposal, complete in place.

19
20 The Engineer will pay for the accepted quantities of gate at the contract
21 unit price per each types and sizes specified in the proposal, complete in place

22
23 The Engineer will pay for following pay items when included in proposal
24 schedule:

Pay Item	Pay Unit
25	
26	
27	
28 6 - Feet, Chain Link Fence	Linear Foot
29	
30 Chain Link Gate, 6 - Feet High and 12 - Feet Wide	Each”
31	
32	

33 **END OF SECTION 607**

SECTION 610 – REINFORCED CONCRETE DRIVEWAYS

Make the following amendment to said Section:

(I) Amend 610.04 - Measurement by replacing lines 56 to 57 to read:

“610.04 Measurement. The Engineer will measure reinforced concrete driveways per each as specified in the proposal.

(II) Amend 610.05 – Payment by revising lines 59 to 76 to read as follows:

“610.05 Payment. The Engineer will pay for the accepted quantities of reinforced concrete driveways at the contract unit price per each as specified in the proposal.

Payment will be full compensation for the work prescribed in this section and contract documents.

The Engineer will pay for following pay item when included in proposal schedule:

Pay Item	Pay Unit
12" Reinforced Concrete Driveway	Each

The Engineer will pay for precast concrete drop curb and driveway curb, or cast-in-place integral curb and gutter under Section 638 - Portland Cement Concrete Curb and Gutter.

The Engineer will pay for excavation of unsuitable material and backfill with material acceptable to the Engineer under Section 203 – Excavation and Embankment. If no pay item exists, refer to Subsection 104.02 – Changes.”

END OF SECTION 610

1 Make the following section a part of the Standard Specifications:

2
3 **“SECTION 627 – MANAGEMENT OF CONTAMINATED MATERIALS**

4
5 **627.01 Description.** This section describes the following:

6
7 The State’s Hazard Evaluation and Emergency Response System
8 (iHEER) indicates the potential of contaminants that may be encountered
9 during the construction activities associated with the Sand Island Access Road
10 Truck Weigh Station project.

11
12 Soils impacted by contaminants may be encountered during the Truck
13 Weigh Station project and shall be handled in accordance with this
14 specification and State and Federal Regulations.

15
16 **627.02 Materials.** Not applicable.

17
18 **627.03 Construction.**

19
20 **(A) Submittals Prior to Construction.** Submit the following
21 submittals a minimum of ten (10) working days prior to beginning the
22 work:

23
24 **(1) Construction – Environmental Hazard Management**
25 **Plan (C-EHMP).** A plan shall be submitted for review that
26 describes the procedures, engineering controls and methods the
27 Contractor will use during the excavation, temporary storage,
28 handling, treatment, backfilling and disposal of soil at the project
29 site. The plan should also include soil stockpiling, testing,
30 backfilling procedures, personal protection requirements, work
31 area isolation, construction barriers, wetting methods,
32 decontamination procedures, and emergency procedures.

33
34 The plan shall include the names and qualifications of
35 personnel who will be managing soil activities at the site. The
36 plan should also include copies of current training and
37 certification of all workers by an EPA-approved Hazardous Waste
38 Operations and Emergency Response course, respirator fit
39 testing documentation, and medical clearances.

40
41 **(2)** Proposed schedule of work and performance schedule.

42
43 **(3)** A sketch identifying the location of temporary soil
44 stockpiling.
45

46 **(B) Construction Requirements.** Do not begin work until submittals
47 detailed in **627.03(A)(1) – Construction – Environmental Hazard**
48 **Management Plan (C-EHMP)** are completed and accepted in writing by
49 the Engineer.

50
51 The Contractor shall examine the project site to understand
52 conditions that may affect work and performance.

53
54 The Contractor shall supply all labor, materials, and equipment
55 necessary for the removal, temporary storage, testing, handling, soil
56 backfilling and management of soil to carry out the work in accordance
57 with applicable Federal, State, and local regulations, and these
58 specifications.

59
60 Soil stockpiles shall be placed on 20-mil plastic sheeting and
61 covered to protect from rain, wind, etc. In addition, stockpiles of
62 contaminated soils shall be bermed to keep contaminated rainwater
63 from migrating away from the stockpiles and ultimately off-site. The
64 Contractor shall separate soil into two (2) soil piles. Pile 1 will consist
65 of soil excavated from the depth found to be contaminated (surface to
66 36-inches below ground surface). Pile 2 will consist of soil excavated
67 from 36-inches below ground surface and deeper. The intent of
68 separating the soil is to utilize potentially unimpacted soil as backfill
69 and/or to remove and dispose of impacted soils from the site. Soil from
70 Piles 1 and 2 will be tested for RCRA metals and chlorinated pesticides.
71 If soil concentrations are below the Department of Health (DOH)
72 Environmental Action Levels (EAL), then the soil may be used with no
73 restrictions as long as it meets other specification requirements.

74
75 The Contractor shall also test any residual soils not used as
76 backfill for Toxicity Characteristic Leaching Procedure (TCLP) for
77 metals and chlorinated pesticides. Soils with concentrations above the
78 regulatory limit shall be disposed of in accordance with regulatory
79 requirements.

80
81 Soil excavation activities, trenching, and any disturbance of
82 contaminated soils containing soil may cause a potential exposure to
83 Contractor's employees and the general public to fugitive dust. The
84 routes of exposure of dusts are by inhalation, ingestion and dermal
85 contact. The Contractor shall use engineering controls such as water
86 spraying and wind barriers to control fugitive dust.

87
88 The Contractor shall provide a Qualified Consultant (QC) with at
89 least five (5) years of experience in the handling and management of
90 soils impacted by hazardous chemicals to manage the project.
91 Contractor shall be responsible for implementation of the engineering

controls and conformance with the requirements of this specification. The QC shall be responsible for monitoring and documentation of the engineering controls and conformance with the requirements of this specification.

(C) Submittals After the Construction. Submit the following submittals within thirty (30) days after work is completed.

(1) Close-Out Report shall include the following:

(a) Laboratory results for any soils or groundwater subject to sampling.

(b) The Waste Manifest signed by the Contractor, waste transporter, and landfill operator. The total quantity of waste should also be included.

(c) A signed certificate stating that the removal and disposal of contaminated items were completed in accordance with the Contractor's approved Work Plan and all applicable rules and regulations.

(d) If required, any results from project air monitoring.

(D) References.

(1) Quality Standards. All work under this contract shall be performed in strict accordance with all applicable Federal, State, and local regulations, standards, and codes governing hazardous material impacted soil.

(2) The most recent editions of any relevant regulation, standard, document, or code shall be in effect. When conflict regarding the requirements or with these specifications arises, the most stringent requirements shall apply. Such documents include, but are not limited to, the following:

(a) 29 CFR 1910, "Occupational Safety and Health Standards" (General Industry Standards)

(b) 29 CFR 1910.120, "Hazardous Waste Operations and Emergency Response"

(c) 29 CFR 1910.134, "Respiratory Protection"

(d) 29 CFR 1910.1000, "Air Contaminants"

- (e) 29 CFR 1910.1020, "Access to Employee Exposure and Medical Records"
- (f) 29 CFR 1910.1200, "Hazard Communication"
- (g) 29 CFR 1926, "Safety and Health Regulations for Construction" (Construction Industry Standards)
- (h) 40 CFR 50, "National Primary and Secondary Ambient Air Quality Standards A"
- (i) 40 CFR 122, "EPA Administered Permit Program: The National Pollutant Discharge Elimination System"
- (j) 40 CFR 261, "Identification and Listing of Hazardous Waste"
- (k) 40 CFR 263, "Standards Applicable to Transporters of Hazardous Waste"
- (l) 40 CFR 302, "Designation, Reportable Quantities, and Notification"
- (m) 49 CFR 172, Subpart E, "Labeling"
- (n) 49 CFR 172, Subpart F, "Placarding"
- (o) 12-8-3-148.1, "State of Hawaii, Safety and Health Regulation for Construction" (Construction Industry Standard)
- (p) 12-202-33, "A Hawaii Occupational Safety and Health Standards"
- (q) HDOH, 2012. Evaluation of Environmental Hazards at Sites with Contaminated Soil and Groundwater, Volume 2: Background Documentation for the Development of Tier 1 Environmental Action Levels, Appendices 2-9. Fall 2011. Prepared by: State of Hawaii, Department of Health, Environmental Management Division. Fall 2011. (Revised Fall 2017).
- (r) TGM, 2008, Technical Guidance Manual for the Implementation of the Hawaii State Contingency Plan, State of Hawaii, Department of Health, Hazard Evaluation

and Emergency Response Office, Interim Final – In Effect
October 31, 2018.

(E) Excavation and Disturbance of Soil. During the excavation and disturbance of contaminated soil, all workers, supervisory personnel, subcontractors and consultants must take precautionary measures as necessary to prevent exposure of Contractor's employees and the general public to the resulting soil dust.

(F) Contractor Training. Each employee shall be instructed for a minimum of forty (40) hours by a trained professional in hazardous materials operations and emergency response, awareness and work practices, safety and health precautions and the use and requirements for protective clothing, respirators, and equipment in accordance with 40 CFR 1910.120. A certificate of training, signed and dated by the trainer, shall be provided for each worker. The Contractor shall designate a competent person(s) to perform or supervise soil excavation and disturbance.

(G) Personal Protective Equipment.

(1) Protective Clothing. Furnish personnel involved in removal, handling, disposal of soil and contaminated items with impervious, disposable, whole body protective covering, face shields with goggles and impervious gloves. All the protective clothing shall be worn throughout the removal of contaminated items and shall be replaced as necessary.

(2) Respirators. Provide as a minimum, half-face respirators approved by the National Institute for Occupational Safety and Health (NIOSH), Department of Health and Human Services, with filters approved for use in atmospheres that contain hazardous material.

(3) Warning Signs and Labels. Provide warning signs at approaches to the work area. Locate signs at such a distance that personnel may read the sign and take necessary precautions before entering the area. Provide and affix labels to Department of Transportation (DOT) approved waste drums and other containers of containing contaminated materials. The caution label must display the following in bold print: **Caution: May Contain Hazardous Materials.** "No Smoking" signs, warning signs and labels shall be provided throughout the entire project and as deemed necessary by the QC.

229 **(H) Polyethylene Sheeting.** Sheet plastic shall be new, clear, or
230 black with at least 20-mil thickness. 6-mil plastic can be used to cover
231 the stockpiles.

232
233 **(I) General Work Procedures.**
234

235 **(1)** Prior to beginning work, the Contractor and the QC shall
236 discuss the approved Plan, including work procedures and safety
237 precautions. At the conclusion of the project, the Contractor shall
238 submit a signed certificate stating that the removal and disposal
239 of contaminated items were completed in accordance with the
240 Contractor's approved Plan and all applicable rules and
241 regulations.
242

243 **(2)** Contractor is responsible for providing their personnel with
244 appropriate training and protective equipment while they are
245 performing work and shall ensure compliance with any and all
246 regulations concerning safety and health of their employees.
247

248 **(3)** Boundaries shall be established at each area where soil
249 excavation/disturbance is to be performed. The area should be
250 clearly identified to prevent unauthorized entry. Establish a
251 control area completely enclosing/roping-off the area where
252 hazardous material contaminated soil excavation, removal,
253 stockpiling, and disposal operations will be performed.
254

255 **(4)** Provide physical boundaries around the hazardous
256 material control area by roping off the area to ensure that
257 airborne concentrations of contaminants will not reach their
258 action levels and/or permissible exposure limits outside the
259 control area.
260

261 **(5)** Caution signs shall be placed at the entrances to each
262 work area, located such that approaching personnel may read
263 the signs and take necessary precautions before entering the
264 work area. No one will be permitted in the work area unless the
265 person is provided with appropriate training and protective
266 equipment, and their presence is necessary to the removal work.
267

268 **(6)** There shall be no eating, smoking, drinking, or storing of
269 food or drink within work areas.
270

271 **(7)** Select and conduct the removal procedure to minimize the
272 potential spread of contamination. Handle contaminated items
273 such that no skin contact occurs. Contaminated materials shall
274 not be exposed to open flames or other high temperatures.

(8) Before exiting the controlled area and before food breaks, each worker will remove all personal protective equipment, place disposable items in a labeled, impermeable disposal bag, and then exit the area. Workers shall wash their hands thoroughly with a detergent soap to remove contamination. Boots shall be cleaned to minimize tracking of contaminated material from the work area.

(9) At the completion of work in an area, the work area shall be cleaned as necessary and all contaminated clothing, disposable personal protective equipment surface coverings, and waste material shall be disposed of with the contaminated items.

(J) Soil Disturbance/Excavation. The Contractor shall notify the Engineer at least ten (10) working days prior to the start of excavation of hazardous material impacted soil. Stage operations to minimize the amount of time hazardous material impacted soil are exposed to the weather. Provide protection measures around the area of hazardous material impacted soil to divert runoff of water from within the excavation boundaries. Runoff that comes in contact with hazardous material impacted soil shall be retained on-site and shall not be allowed to drain off-site or into storm water conveyances systems.

(1) The Contractor's Qualified Consultant shall be continuously on-site to inspect excavated soil to expedite the work.

(2) Prior to any disturbance/excavation activities, locate the area identified in the approved Work Plan where excavated soil will be stockpiled.

(3) Soil stockpiles shall be placed onto 20-mil plastic sheeting and covered with 6-mil plastic sheeting and secure the edges of the liner with a soil berm, stakes, or equivalent to contain potential surface water runoff.

(4) Any excavated soil that, based on the RCRA metals and chlorinated pesticides concentrations, are below the respective HDOH EALs shall be reused as backfill on the project site. Soil with RCRA metals and chlorinated pesticide concentrations above the EALs will be used for backfill at depths greater than 3-feet below ground surface. The Contractor shall place 2-feet of clean topsoil over hazardous material impacted soil. The purpose is to reduce the amount of soil for disposal off-site.

(5) The Contractor is responsible for all the testing and proper disposal of any soil that is not used as backfill.

(K) Final Cleanup.

(1) Maintain surfaces in the work area to be free of accumulations of contaminated materials. Restrict the spread of dust and debris, and to keep waste from being distributed over the work area.

(2) When work which disturbs contaminated soil has been completed, the QC will visually inspect the work area for evidence of contaminated materials and direct the Contractor to clean and remove remaining contaminated materials. The Contractor shall not dismantle the work area boundaries prior authorization by the QC.

(3) Earthmoving equipment which contacts contaminated subgrade materials shall be cleaned with a water spray immediately upon completion of work. The wash location shall be located immediately adjacent to the contaminated soil excavation and all wash water shall be directed into the excavation.

(L) Transportation and Disposal.

(1) The Contractor shall transport and dispose of any excess soil that cannot be backfilled to the landfill that will accept such soil. Additional sampling and analysis will be required per landfill requirement.

(2) Upon transportation and disposal, the Contractor shall submit copies of the waste shipping papers for both hazardous and non-hazardous wastes and Certificates of Disposal to the Engineer. The Contractor shall also include all waste shipping papers and Certificates of Disposal in the Completion Report.

(M) Air Monitoring.

(1) Air monitoring shall be conducted for at least three (3) full 8-hour shifts to establish a negative exposure assessment for worker's exposure to airborne hazardous material. After the establishment of the negative workers exposure, periodic personal monitoring shall be conducted once every seven (7) days to document worker exposure for the duration of the hazardous material contaminated soil work. Perimeter air

monitoring shall be conducted throughout the entire duration of contaminated soil work.

(2) Submit air sampling results to the Engineer within five (5) working days after the samples are collected, signed by the testing laboratory employee performing the analysis.

(3) Perform personal and area monitoring during the contaminated soil work operation. Sufficient area monitoring shall be conducted at the physical boundary to ensure unprotected personnel are not exposed above Action Level (AL) and/or Permissible Exposure Limit (PEL) at all times. If the outside boundary levels are at or exceed AL and/or PEL, work shall be stopped, and the Contractor and the Qualified Consultant shall immediately correct the condition(s) causing the increased levels and notify the Engineer immediately.

627.04 Measurement. The Engineer will measure clearing and grubbing, excavation, testing, and disposing of unsuitable material from work site in accordance with the applicable Sections.

Work under this section, excluding clearing and grubbing, excavation, testing, and disposing of unsuitable material, will be paid on a lump sum basis. Measurement for payment will not apply.

The Engineer will measure additional management of contaminated materials required and requested by the Engineer on a force account basis in accordance with Subsection 109.06 – Force Account Provisions and Compensation.

627.05 Payment. The Engineer will pay for the accepted clearing and grubbing, excavation, testing, and disposing of unsuitable material from work site under the applicable Sections.

The Engineer will pay for accepted pay items listed below at contract price per pay unit, as shown in the proposal schedule. Payment will be full compensation for work prescribed in this section and contract documents.

The Engineer will pay for the pay item when included in the proposal schedule:

Pay Item	Pay Unit
Management of Contaminated Materials	Lump Sum
Additional Management of Contaminated Materials	Force Account

413
414 An estimated amount for force account is allocated in the proposal
415 schedule under 'Additional Management of Contaminated Materials', but
416 actual amount to be paid will be the sum shown on accepted force account
417 records, whether this sum be more or less than estimated amount allocated in
418 the proposal schedule. The Engineer will pay for measures requested by the
419 Engineer that are beyond scope of accepted Construction – Environmental
420 Hazard Management Plan (C-EHMP) on a force account basis.”
421
422
423
424
425

END OF SECTION 627

SECTION 629 - PAVEMENT MARKINGS

Make the following amendments to said Section:

(I) Amend **Subsection 629.03(B) – Temporary Pavement Markings** by revising the third paragraph from line 62 to 63 to read:

“Maintain and replace temporary pavement markings, flexible delineators, and barricades.”

(II) Amend **Table 629.03 – 1 – Temporary Pavement Markings** to read as follows:

“TABLE 629.03-1 TEMPORARY PAVEMENT MARKINGS	
TYPE	PAVEMENT MARKINGS
Passing Permitted - Both Sides	Single 4-inch yellow stripe 5 feet in length spaced 20 feet on center with Type D markers spaced 40 feet on center and located on center of 5-foot length of stripe.
Passing Prohibited - Both Sides	Double solid 4-inch yellow stripes with Type D markers placed 20 feet on center on one of 4-inch yellow stripes selected by the Engineer.
Passing Permitted - One Side Only	Single continuous 4-inch yellow stripe with Type D markers placed on stripe 20 feet on center on no-passing side and single 4-inch yellow stripes 5 feet in length spaced 20 feet on center on passing side.
Lane Lines - Lane Changing Permitted	Single 4-inch yellow or white stripe 5 feet in length spaced 20 feet on center with Type C or Type D markers spaced 40 feet on center.
Lane Lines - Lane Changing Prohibited	Double solid 4-inch white stripes with Type C markers placed 20 feet on center on one of the 4-inch white stripes selected by the Engineer.
Crosswalk	Two 12-inch white transverse lines spaced 8 feet on center or as ordered by the Engineer.
Stop Line	Single 12-inch white transverse line.
Note: Paint may be used for temporary markings in areas where final paving is not complete.”	

(III) Amend **629.04 – Measurement** by revising lines 292 to 294 to read as follows:

19 **"629.04 Measurement.**

- 20
- 21 (A) The Engineer will measure thermoplastic and preformed pavement
- 22 marking tape per linear foot in accordance with the contract
- 23 documents. The longitudinal pavement markings will be measured per
- 24 linear foot as a single stripe for the width specified in the contract and
- 25 in the proposal. The Engineer will include the longitudinal gaps for skip
- 26 striping, up to thirty (30) feet long, in the measurement.

27

28 The Engineer will not measure temporary pavement markings

29 including flexible delineator posts with reflector makers or Type I

30 Barricades and temporary signs installed for the longitudinal guidance

31 of public traffic over reconstructed areas, cold planed surfaces, newly

32 paved surfaces or other unmarked or scarified areas for payment.

33

34 The Contractor shall consider the work required for the removal of

35 pavement markings incidental to the various contract items, except as

36 provided in the proposal or elsewhere in the contract. If the contract

37 stipulates that the Engineer will make payment for the removal of

38 pavement markings, the Engineer will measure the removal of

39 pavement markings.

- 40
- 41 (B) The Engineer will measure the painted stripes that are twelve (12)
- 42 inches wide or less as a single stripe. The Engineer will measure the
- 43 painted stripes over twelve (12) inches wide as two (2) stripes. The
- 44 Engineer will measure the double stripes that are twelve (12) inches or
- 45 less in total width as a single stripe.

46

47 The Engineer will measure the longitudinal pavement markings by

48 the linear foot according to the contract. Longitudinal gaps for skip

49 striping that are 30 feet or less will be included in the measurement.

50

51 The Engineer will measure pavement Symbol (Yield Triangle),

52 pavement Symbol (Arrow), pavement Stop Bar and Lettering per each

53 as complete units of the type and design specified in the proposal."

- 54
- 55 (IV) Amend **629.05 – Payment** by revising lines 296 to 330 to read as follows:
- 56

57

58

59 **"629.05 Payment.**

- 60
- 61 (A) The Engineer will pay for thermoplastic and preformed pavement
- 62 marking tape at the contract price per linear foot basis according to the
- 63 contract, complete in place, including primers.
- 64

The Engineer will pay for double four (4) inch striping with a four (4) inch space between stripes at the contract price per linear foot basis according to the contract.

The Engineer will pay for pavement arrows (single and multiple heads), symbols, and words at the contract price per each according to the contract.

The contract unit price paid shall be full compensation for furnishing labors, materials, tools, equipment and incidentals and for doing the work involved in furnishing and installing pavement markings complete in place according to the contract.

The Engineer will not pay for the temporary pavement markings including flexible delineator posts with reflector markers or Type I Barricades and temporary signs installed for the longitudinal guidance of public traffic over reconstructed areas, cold planed surfaces, newly paved surfaces or other unmarked or scarified areas for payment if not shown in the proposal separately. The Engineer will consider them incidental to the various contract items.

If the contract specifies payment for temporary pavement markings installed as ordered by the Engineer for special temporary traffic patterns, the Engineer will pay from an allowance for "Temporary Construction Zone Markings".

If the contract specifies payment for removal of pavement markings under unit price pay items, the Engineer will pay for the accepted quantities at the contract unit prices bid. The prices shall be full compensation for removing such items according to the contract.

(B) The Engineer will pay for painted pavement striping at the contract price per linear foot basis according to the contract.

The Engineer will pay for pavement arrows (single or multiple arrow heads), symbols, and words at the contract price per each according to the contract.

The Engineer will pay for the following pay items when included in the proposal schedule:

Pay Item	Pay Unit
4-Inch Pavement White Striping (Thermoplastic Extrusion)	Linear Foot
4-Inch Pavement Yellow Striping (Thermoplastic Extrusion)	Linear Foot

112		
113	4-Inch Dashed Pavement White Striping (Thermoplastic Extrusion)	
114		Linear Foot
115		
116	8-Inch Pavement White Striping (Thermoplastic Extrusion)	Linear Foot
117		
118	12-Inch Pavement White Striping (Thermoplastic Extrusion)	Linear Foot
119		
120	Pavement Symbol White (Thermoplastic Extrusion) (Yield Triangle)	Each
121		
122	Pavement Symbol White (Thermoplastic Extrusion) (Arrow)	Each
123		
124	Pavement Stop Bar and Lettering, White (Thermoplastic Extrusion)	Each
125		
126		
127		
128		
129		

END OF SECTION 629

SECTION 631 – TRAFFIC CONTROL, REGULATORY, WARNING, AND MISCELLANEOUS SIGNS

Make the following amendment to said Section:

(I) Amend Section 631.03(C) Labeling of Signs, from lines 42 to 51 to read:

“(C) Labeling of Signs. Label back of each sign with sign stickers as directed by the State. Sign stickers will be provided by the State.”

(II) Amend Section 631.04 – Measurement by replacing lines 67 to 69 to read:

“631.04 Measurement. The Engineer will measure regulatory and miscellaneous signs as complete units of the type and design specified in the proposal.”

(III) Amend Section 631.05 – Payment by replacing lines 71 to 99 to read as follows:

“631.05 Payment. The Engineer will pay for regulatory and miscellaneous signs at the contract price per each for the type and design specified complete in place. Payment will be full compensation for excavating and backfilling, furnishing and installing materials, furnishing equipment, tools, labors and incidentals necessary to complete the work.

The Engineer will pay for the following pay items when included in the proposal schedule:

Pay Item	Pay Unit
Traffic Control Regulatory and Miscellaneous Sign	Each

END OF SECTION 631

- 1
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(I) Amend Section 632.04 - Measurement by replacing lines 79 to 81 to read:

(II) Amend Section 632.05 – Payment by replacing lines 83 to 100 to read:

The Engineer will pay for the following pay items when included in the proposal schedule:

Pay Item	Pay Unit
Roadway Raised Pavement Marker	Each
Flexible Delineator Post and Reflector, 3-Foot High	Each

**NH-064-1(010)R
632-1a**

7/23/25

1 Make the following Section a part of the Standard Specifications:

2
3 **SECTION 636 – E-CONSTRUCTION**
4
5

6 **636.01 Description.** This section specifies requirements for performing the
7 Project in a “paperless” manner, using electronic tools for all submittals,
8 communications, quantity tracking, testing and sampling, scheduling, quality
9 control, and performance monitoring.

10
11 **636.02 General Requirements.** The Contractor shall implement the use of the
12 E-Construction platform, as provided by the HDOT and directed by the Engineer,
13 for use throughout the project. Paper-based or hard copy submittals will not be
14 accepted.

15
16 This Special Provision shall take precedence over all other Specification
17 sections with respect to providing and receiving paper copy communications,
18 submittals, and any project records. Where conflicts exist, and a decision between
19 a hard-copy item and a corresponding electronic version is needed, the electronic
20 version shall be selected, unless otherwise directed by the Engineer.

21
22 **636.03 Construction**
23

24 **(A) Plans and Specifications.** Project drawings will not be provided to
25 the Contractor in hard copy format. An electronic version will be provided
26 in the E-Construction platform for use during the project.

27
28 The Contractor shall note all changes to the work, including all
29 subcontractor’s work, in electronic format using the E-Construction
30 platform. Red annotations shall be used to note changes. Blue annotations
31 shall be used for any additional notes that will be helpful for the State in
32 interpreting the field posted drawings. Other drafting standards may be
33 implemented by the Engineer and shall be adhered to by the Contractor.
34 Changes shall be input by the Contractor and reviewed by the Engineer
35 monthly. The Contractor shall make any changes that the Engineer
36 requires.

37
38 **(B) Submittals.** The Contractor shall provide all required submittals, as
39 listed within the contract documents, via the E-Construction platform. All
40 review, approval, and resubmittal regarding submittals shall also be
41 documented within the E-Construction platform.

42
43 **(C) Correspondence.** Electronic mail (email) shall be the preferred
44 method of electronic communication. All communications that affect project
45 scope, schedule, cost, or quality, including changes and requests for
46 information, shall be submitted as directed by the Engineer.

(D) Prosecution and Progress. The Contractor shall provide all administrative, management, and project support documents required by various specification sections, using the E-Construction platform. These elements include, but are not limited to:

- (1) Preconstruction Data Submittal (Section 108.03)
- (2) Correspondence regarding Contract Time (Section 108.05) and Delays
- (3) Progress Schedules (Section 108.06)
- (4) Weekly Meeting preparatory materials (Section 108.07)
- (5) Samples, certifications, material data, installation instructions, and shop drawings (Sections 105 – Control of Work and 106 -Material Restrictions and Requirements)
- (6) Field-posted Drawings (Section 648)
- (7) Pre-Final and Final Inspection submittals (Section 108.13)
- (8) Warranty documentation – Guarantee of Work (Section 108.17)
- (9) Project Closing Documents – Final Settlement of Contract (Section 108.19)

In addition to the foregoing, the Contractor shall provide any other materials, correspondence, and submittals using the E-Construction platform as directed by the Engineer.

(E) Resources. The Contractor shall provide a comprehensive list of Contractor labor and equipment, including all subcontractor labor and equipment, that will be deployed on the project, using spreadsheet-based templates provided in the E-Construction platform. All template fields shall be completed. The submitted information shall comply with the requirements of Specification Section 108 – Prosecution and Progress (identification of labor and equipment resources) and Specification Section 109 - Measurement and Payment (cost data) and represent all individual personnel with labor categories and rates, and all equipment owned or rented, with associated rates, on this project. Updates for additional personnel or equipment shall be accomplished by the Contractor at will and shall be completed when directed by the Engineer.

(F) Electronic Ticketing. The Contractor/supplier shall provide electronic material tickets for all loads of Asphalt Mix (Hot Mix Asphalt Concrete, Hot Mix Asphalt Base Course, or Stone Matrix Asphalt), Portland Cement Concrete (PCC), or Construction Aggregates delivered to the project.

The Contractor/supplier may use the plant ticketing system of their choice to create the material ticket data.

Digital material records created, altered, or voided by a person with direct knowledge of the event (the weighmaster or batch person) must be transmitted directly from the plant computer system (scale and batch) to the Department of Transportation at or near the time of the event.

Should digital material records be transmitted to the Department of Transportation through other methods, the weighmaster or batch person must certify the digital material records received by the Department of Transportation daily.

The Department's minimum service level expectation is to receive tickets no later than 5 minutes from when they were created, 99.5% of the time. The Department of Transportation may reject any ticket(s) received later than 5 minutes from when the ticket was created.

(1) Ticket data shall include the following:

(a) Material ticket data will be submitted to the agency via direct connection or a Hypertext Transfer Protocol (HTTPS) post as JavaScript Object Notation (JSON) documents.

(b) Material suppliers must test to confirm that ticketing data can be shared from the originating system no less than 10 days before the project starts. The topic shall be discussed at the pre-construction meeting.

(c) Ticket data must be available immediately upon project start so that tickets can be viewed without delay.

(d) Provide the same data currently accessible and viewed by agency users previously on printed tickets for state projects.

(2) The Contractor shall submit material ticket data in accordance with the plant manufacturer's system recommendations to provide the following unless otherwise directed by the Engineer:

(a) Net weight (or volume for ready mix concrete) of material being transported to the nearest 0.01 ton or cubic yard.

(b) Running daily total of net weight of material (or volume for ready mix concrete) being transported to the nearest 0.01 ton or cubic yard.

(c) Each material ticket shall contain the following:

a. General Ticket information (All Materials)

1. Date
2. State Project Name
3. State Project Number
4. Name of Contractor
5. Name of Material Supplier
6. Customer Name
7. Hauler
8. Unique Truck ID
9. Plant/scale name (source)
10. Unit of Measure
11. Ticketed time
12. Ticket Number

b. Asphalt Mix

1. Material Name/Description
2. Gross Weight (if not automatic)
3. Tare Weight (if not automatic)
4. Net weight
5. Mix Design Number
6. Weighmaster

c. Portland Cement Concrete

1. Loaded time (water/cement time)
2. Wet and dry batch weights (if computer generated)
3. Water:
 - i. In aggregate
 - ii. Total water
 - iii. Water/cement ratio
 - iv. Allowable water to add
4. Admixtures (including brand names if available):
 - i. Retarder and weights
 - ii. Water reducer and weights
 - iii. Air entrainment and weights
 - iv. Special performance admixtures and weights
 - v. Concrete fibers
5. Mix Design
6. Slump

184 7. Truck Revolution

185
186 d. Construction Aggregates:

- 187
188 1. Material Name/Description
189 2. Gross Weight (if not automatic)
190 3. Tare Weight (if not automatic)
191 4. Net weight
192 5. Mix Design Number
193 6. Weighmaster

194
195 e. Optional Additional Truck Status (Will be
196 accepted when available – All Materials)

- 197
198 1. Left plant
199 2. Arrive at project
200 3. Begin unload
201 4. Finish unload
202 5. Leave project
203

204 **636.04 Measurement.** The Engineer will measure additional E-Construction
205 programs, additional licenses, or additional equipment, if ordered by the Engineer,
206 on a force account basis in accordance with Subsection 109.06 – Force Account
207 Provisions and Compensation.

208
209 **636.05 Payment.** The Engineer will pay for the additional E-Construction
210 programs, additional licenses, or additional equipment, on a force account basis in
211 accordance with Subsection 109.06 – Force Account Provisions and
212 Compensation.

213
214 The Engineer may withhold progress payment until the Contractor is in
215 compliance with all E-Construction requirements.

216

217 Pay Item	218 Pay Unit
219 Additional E-Construction Programs, additional licenses 220 or additional equipment	221 Force Account

222 An estimated amount for force account may be allocated in the proposal
223 schedule under “Additional E-Construction Programs, additional licenses or
224 additional equipment.” The actual amount to be paid will be the sum shown on
225 accepted force account records.

226
227
228 **END SECTION 636**
229

1 **SECTION 638 – PORTLAND CEMENT CONCRETE CURB AND GUTTER**

2
3 Make the following amendments to said Section:

4
5 **(I)** Amend **638.04 – Measurement** by revising lines 130 to 131 to read as
6 follows:

7
8 **“638.04 Measurement.** The Engineer will measure curb and/or gutter, both
9 new and reset, by the linear foot. The Engineer will measure along the front face
10 of the curb at the finished grade elevation. If the Engineer measures gutter
11 separately, the Engineer will measure gutter along the front face of the gutter.
12 The Engineer will not make deduction in gutter length for drainage
13 appurtenances installed such as catch basins and drop inlets.

14
15 The Engineer will measure curb and/or gutter transition for payment as
16 follows:

17

From	To	Measurement for Payment
Cast-in-place Curb or Precast Curb	Cast-in-place Curb and Gutter	Cast-in-place Curb and Gutter
Cast-in-place Curb and Gutter	Precast Curb and Cast-in-place Gutter	Cast-in-place Curb and Gutter
Cast-in-place Curb and Gutter Type _____	Cast-in-place Curb and Gutter Type _____	Cast-in-place Curb and Gutter 1/2 of Transition to each type
Cast-in-place Curb Type _____	Cast-in-place Curb Type _____	Cast-in-place Curb 1/2 of Transition to each type

18
19 The Engineer will measure precast concrete drop curb and driveway curb
20 or cast-in-place integral driveway curb and gutter under the adjacent normal curb
21 and/or gutter.”

22
23 **(II)** Amend **638.05 – Payment** by revising lines 133 to 148 to read as follows:

24
25 **“638.05 Payment.** The Engineer will pay for the accepted quantities of curb
26 and/or gutter at the contract unit price per linear foot for each type of curb and/or
27 gutter specified.
28

29 Payment will be full compensation for work prescribed in this section and
30 contract documents.

31
32 The Engineer will pay for each of the following pay items when included in
33 proposal schedule:

34	35 Pay Item	36 Pay Unit
37	6" Concrete Curb	Linear Foot
38		
39	4' Wide Concrete Through Gutter	Linear Foot
40		
41	6" Concrete Curb and Gutter	Linear Foot
42		
43		
44		

45 **END OF SECTION 638**

1 **SECTION 645 – WORK ZONE TRAFFIC CONTROL**
2
3

4 Make the following amendments to said Section:

5
6 **(I)** Amend 645.03(C)(1) General by revising the first paragraph from lines 173
7 to 174 to read as follows:

8
9 **“(1) General.** Provide, erect, and maintain necessary barricades,
10 including pinned and unpinned concrete barriers, suitable for protection of work
11 and safety of the public. All work zone devices shall be MASH compliant, except
12 for portable concrete barriers that were constructed before 2020; those barriers
13 may be compliant to NCHRP 350.”
14
15

16 **END OF SECTION 645**
17

1 **SECTION 648 – FIELD-POSTED DRAWINGS**
2
3

4 Make the following amendments to said Section:
5

6 **(I)** Amend **648.03 – Construction Requirements** by revising lines 8 to 12 as
7 follows:
8

9 **“648.03 Construction Requirements.** The Engineer will provide electronic
10 sets of plans for the Contractor’s use in noting all changes to the work. Use red
11 markings to note the changes. Use blue markings to add any additional notes that
12 will be helpful for the State to post the field-posted drawings.”
13

14 **END OF SECTION 648**
15

1 Make the following section a part of the Standard Specifications:

2
3 **“SECTION 651 - EXTERIOR ELECTRICAL WORK**

4
5 **651.01 Description.** This work includes constructing electric and
6 telecommunications utility underground structures and facilities, and ductlines
7 required for the construction of Hawaiian Electric Company (HECO) secondary
8 service and Weigh-In-Motion System equipment according to the contract or as
9 specified by the Engineer. HECO will furnish, install, connect and test all
10 proposed overhead wire and cable as may be required, including guy wires.
11 HECO will also remove and/or install utility poles and anchors as necessary.

12
13 **651.02 Materials.** Furnish all materials for electrical apparatus, HECO
14 metering equipment, pullboxes, ductlines and conductors unless otherwise
15 indicated.

16
17 **(A) Submit the following for review:**

18
19 **(1) Product Data.**

20
21 **(a) Panelboards.**

22
23 **(b) Overcurrent protection devices.**

24
25 **(c) Metering equipment.**

26
27 **(d) Junction boxes larger than 6-inch square.**

28
29 **(2) Written notification of all tests and test results as stipulated**
30 **in paragraphs entitled “TESTING” hereinbelow.**

31
32 Materials shall conform to the following:

33
34 Structure Backfill Material 703.20

35
36 Trench Backfill Material 703.21

37
38 Concrete shall conform to Section 601 – Structural Concrete. The maximum size
39 of coarse aggregates shall be three-quarter inch in lieu of the one inch to No. 4
40 specified. Concrete duct banks shall be Class A concrete.

41
42 **(B) Underground Conduit.** Underground conduit and fittings shall be
43 rigid polyvinylchloride (PVC), Schedule 40 or Schedule 80 as indicated.
44 Conduit risers shall be zinc-coated rigid steel. Rigid PVC conduit shall be
45 extruded standard wall electrical conduit and each length shall bear the
46 label of Underwriter's Laboratory, Inc. Adhere to the requirements of U.S.
47 Department of Commerce, Commercial Standard CS207-60.

48 **(C) Rigid Steel Conduit.** Rigid steel, zinc-coated inside and outside,
49 for use with threaded fittings. ANSI C80.1. All surface mounted and
50 exposed raceway shall be galvanized rigid steel.

51
52 **(D) Panelboards.**

53
54 **(1)** Mounting, voltage rating, main bus capacity, breaker
55 complement and lugs as specified on drawings, complete with
56 housing, door, trim, lock and typewritten circuit directory. Provide
57 ground bus for all panels.

58
59 **(2)** Panelboards should have copper bussing with bolt-on,
60 molded case circuit breakers. Provide one-inch-per-pole breakers,
61 half-size breakers not allowed. Circuit breaker complement short
62 circuit ratings shall be fully rated. Use of series rated equipment
63 will not be permitted. Toggle positions "ON", "OFF" and "TRIPPED"
64 engraved or embossed on body and visible without removing
65 enclosure cover.

66
67 **(3)** All locks shall be common-key type. Furnish 6 sets of keys
68 to the Engineer.

69
70 **(4)** Panel housing and entire circuit breaker complement shall
71 be of the same manufacture. NEMA rating of panelboard enclosure
72 shall be as indicated.

73
74 **(E) Circuit Breakers.** Circuit breakers, unless otherwise shown, shall
75 be molded case, toggle mechanism operated, with no-fuse ambient-
76 compensated thermal-magnetic overload automatic trip units for
77 overcurrent and short-circuit protection and contacts rated to interrupt
78 short-circuit currents as specified on Drawings. Multi-pole breakers shall
79 have single, common operating handle for all poles. Toggle positions
80 "ON", "OFF" and "TRIPPED" and breaker rating engraved or embossed on
81 body and visible without removing enclosure cover.

82
83 **(F) Pullboxes.** Furnish and install pullboxes as indicated in the
84 contract documents. Carefully excavate for pullboxes. Install pullboxes so
85 that covers are 1 inch above finished pavement or grade.

86
87 **(G) Secondary Conductors.**

88
89 **(1)** Conductors for secondary circuits shall conform to the
90 following requirements; single conductor, 600 volt, AWG sizes as
91 indicated in the contract documents; stranded copper, Type XHHW,
92 suitable for use at 167 degrees F, with 2/32 inch thick rubber
93 insulation, and 3/64 inch thick neoprene jacket. Rubber insulation

and neoprene jacket shall conform to the NEC, RHW-USE standards, and ICEA S-105-692 standard.

(H) HECO Metering Equipment. Provide in accordance with HECO Standards.

651.03 Construction Requirements.

(A) General. Avoid disturbing existing facilities. Remove and dispose of all demolished or excess material from the job site.

(1) Notify HECO inspection divisions at least 72 hours in advance of intent to commence concreting operations for duct lines.

(2) Construction of HECO's underground facilities shall be in accordance with the latest revisions of HECO Specifications CS7001, CS7003, CS7202, CS9301, CS9401 and applicable HECO standards. Refer to the plans for additional requirements relating to HECO facilities.

(B) Existing Utilities. Existing utilities and utility facilities shown on the plans are approximate locations. Utility facilities to be constructed are shown on the plans in approximate locations for the convenience of the Contractor.

(1) It shall be the Contractor's responsibility to ascertain the location of all existing utilities which may be subject to damage by reason of its operations. The Contractor shall be responsible for and shall pay for all damages to existing utilities of all types.

(2) The Contractor shall:

(3) Support and/or protect as required all facilities during construction,

(4) Notify the Engineer immediately of any damage to any facility caused by construction under this Contract, and

(5) Reconstruct damaged portions of any utility system according to the contract and as specified by the Engineer at no cost to the State.

(C) HECO Access and Coordination. Provide HECO with 24 hour access to all existing HECO and new HECO facilities after they are installed. The Contractor shall be responsible for any delays in company work due to its failure to provide access to company facilities. All existing

HECO facilities shall remain in place until after completing and energizing the proposed permanent and/or temporary facilities, unless otherwise noted on the plans. Any cost of temporary relocations arising during construction for the Contractor's benefit shall be at no cost to the State, HECO.

(1) Electrical equipment or conductors, whether electrically energized or not, shall remain in place at all times during construction unless otherwise indicated. HECO shall perform the handling and moving of electrical equipment or conductors, when required by the Engineer. Work by the Contractor in areas with energized electrical equipment or conductors shall be performed with extreme caution to prevent accidents and to avoid disturbing or damaging the equipment or conductors or any temporary supports or protective guards that are constructed. Unless otherwise permitted by HECO, all work by the Contractor in areas with energized equipment or conductors shall be performed in the presence of a company inspector and/or standby man. The Contractor shall have the sole responsibility for maintaining safe and efficient working conditions and procedures in these areas.

(2) HECO shall replace any existing or new company facilities, including equipment or conductors damaged by the Contractor during construction, at the Contractor's expense.

(3) The Contractor shall give HECO 30 calendar days advance notice for any work to be done by HECO on its facilities. Unless otherwise indicated on the plans or otherwise directed by the Engineer, the utility companies, will:

(4) Remove the concrete envelope from existing underground ducts containing electrical cables.

(5) Construct temporary supports and protective barriers for bare duct and electrical cables immediately after removal of the concrete envelope is completed.

(6) Remove temporary supports and protective barriers constructed under (2) above.

(7) Remove existing joint utility poles and anchors and install new joint utility poles and anchors.

(D) Excavation and Backfill. All excavation and backfill for electric underground structures and trenches shall conform to Section 204 - Excavation and Backfill for Miscellaneous Facilities, modified as follows:

186 **(1) Excavation.**

187
188 **(a)** The width of trenches for duct banks shall not be less
189 than the width of the encasement nor more than that
190 required to properly and safely execute the work.

191
192 **(b)** Excavate the trenches at least 40 feet ahead of duct
193 placement so that any obstruction to the duct line can be
194 avoided through gradual alignment. The Engineer may
195 adjust the profile grade to increase or decrease the
196 excavation depth (up to 3 feet) as a result of unforeseen
197 obstruction at no additional cost.

198
199 **(c)** All excavation shall be inspected by the Engineer and
200 respective utility companies before placing any ducts or
201 conduits or before constructing any structures and
202 foundations.

203
204 **(d)** Do not excavate for ductlines until after staking out
205 and verifying the locations for these structures correctly by
206 the utility companies through the Engineer.

207
208 **(2) Backfill.** Do not place backfill until after verifying the duct
209 and conduit installations by HECO for HECO ductlines and by the
210 Engineer for Weigh-In-Motion ductlines.

211
212 **(a)** Trench backfill material placed below a horizontal
213 plane 12 inches above the top of the duct bank shall conform
214 to Subsection 703.21 (A) - Trench Backfill Material A.

215
216 **(b)** Backfill the remainder of the trench with structure
217 backfill material according to Section 703.20 - Structure
218 Backfill Material with structure backfill material B or with
219 trench backfill material according to Subsection 703.21(B) -
220 Trench Backfill Material B.

221
222 **(E) Installation of Ducts Encased in Concrete Jacket.** Install all
223 plastic ducts installed with concrete jacket or cover unless otherwise
224 indicated. All joints shall be watertight. After conductors and cables are
225 installed, seal conduit ends with duct sealing compound conforming to
226 Subsection 712.27(E) - Duct Sealing Compound. Seal vacant conduits
227 with duct sealing compound or plug designed for that purpose and
228 accepted by the Engineer.

229 **(1) Plastic Conduit Storage and Transportation.**
230

231 **(a)** Conduits that are to be stored for more than 2 weeks
232 shall be covered.

233
234 **(b)** Provide support for the full length of the conduit when
235 transporting or storing long lengths. The Engineer will not
236 permit unsupported overhang.

237
238 **(c) Plastic Conduit Installation.**
239

240 **(i)** Conduit shall be square cut with a fine tooth
241 wood saw. Remove all burrs.

242
243 **(ii)** Wipe all foreign matter off the sockets of the
244 fittings and the edges of the conduit with a clean
245 cloth.

246
247 **(2) Plastic Conduit Solvent-Cemented Joints.**
248

249 **(a)** The cement for PVC conduits should be obtained
250 from the conduit manufacturer. Use a clean paper paint pot
251 for containing the cement during use. The Engineer will not
252 permit adding of thinners to the cement.

253
254 **(b)** Apply a liberal and uniform coat of cement to the
255 conduit for a length equal to the depth of the socket. Also
256 apply sufficient cement to set the socket of the fitting. Avoid
257 excess cement on the fitting as it is wiped into the joint and
258 tends to weaken the pipe. Do not use plastic bristle
259 brushes. The brush size shall be approximately equal to
260 joint depth, for example, a two- inch brush for a four- inch
261 conduit.

262
263 **(c)** Slip the conduit into the socket of the fitting with a
264 slight twist until the conduit bottoms.

265
266 **(i)** Hold the joint for 15 seconds so the conduit
267 does not push out of the fitting. Do not twist or drive
268 the pipe after the insertion is complete.

269
270 **(d)** Cure the joined members for at least five minutes
271 before disturbing or applying stress to the joint. After this
272 initial cure, do not twist or pull the joint. In damp weather,
273 increase this interval to allow for slower evaporation of the
274 solvent. Assemble all conduits above ground and allow the

conduit to lie undisturbed while curing before lowering it into the trench or installing on bridges.

(e) Wipe off excess cement left on the outer shoulder of the fitting.

(f) Another fitting or section of conduit may be added to the opposite end within two or three minutes if care is exercised in handling so that strain is not placed on the previous assembly.

(g) Return the brush to the cement pot after covering the joint surfaces. When stopping work, place the brush in a solvent; pour unused cement back in the can and cover tightly. When re-using the brush, shake out the excess solvent before dipping it into the cement.

(h) Assemble any joint, included in a section of conduit to be bent, above ground and allow to lie undisturbed for at least two hours before installation in a trench. In cases where a plastic connection is made with the union under stress due to misalignment or other factors, stake out the union to relieve stress on the joint until after backfilling or encasing the conduit.

(i) Cover all open trenches at the end of each work day to minimize accidental mechanical damage to conduits.

(3) Plastic Conduit Temperature.

(a) All conduits shall be cool prior to placing in trenches and when the concrete jacket is being poured.

(b) Due to expansion and contraction of the plastic conduit of 1-1/2 inches per 100 feet for every 20°F change in the temperature, allow extra conduit footage at each tie-in for contraction when the conduit temperature is higher than that of the earth; or extra room for expansion if the converse condition exists.

(4) Plastic Conduit Spacers.

(a) Place spacers for plastic conduit along the length of the conduit at a maximum spacing of six feet on center.

319 (b) The terminated ends of the conduit in an underground
320 structure shall be free of support for a distance of at least 10
321 feet from the structure. Align and support the conduit
322 inside the structure with proper spacing and cut to length
323 after the concrete envelope has cured.

324
325 (c) Seal the ends of the conduit with a plastic cap or plug
326 at the end of each day's work, when work on duct installation
327 has to be interrupted, where ducts may be submerged in
328 water, or in stub-outs.

329
330 (d) Test, in the presence of utility company inspectors,
331 the completed ducts provided for utility company use by
332 passing a bullet shaped test mandrel about 12 inches long
333 with a diameter 1/2 inch less than the inside diameter of the
334 ducts through the length of each duct run. Scars in the
335 mandrel deeper than 1/32 inch, other than that caused by
336 normal abrasion between the duct line and bottom of
337 mandrel are an indication of the presence of burrs and/or
338 obstructions in the duct run. Remove such burrs and/or
339 obstructions, after which the test mandrel will be passed
340 through again. Repeat the process until approved by the
341 respective utility inspector.

342
343 (e) After testing, furnish and install muletape in HECO
344 ducts in accordance with HECO standards, plug both ends
345 of each duct with plastic plugs.

346
347 **(F) Conductors.**

348
349 (1) Provide conductors conforming to the NEC. Arrange
350 conductors within enclosures, cabinets, standards, and pullboxes
351 neatly; and cable together using self-clinching nylon cable ties or
352 other method accepted by the Engineer.

353
354 (2) Encase conductors installed underground in conduit.

355
356 (3) Immediately before installing conductors, pull wire brush
357 through each conduit to remove extraneous matter, obstructions an
358 debris.

359
360 (4) Furnish conductors on reels. Pull conductors directly from
361 their cores or reels into conduits with cable grip designed to provide
362 firm hold on exterior covering of conductors or cables. Do not pull
363 off and lay conductors on the ground before installation. Make pulls

in one direction only. Use UL or ETL listed insert lubricant. Do not leave conductors under tension or tight against bushings or fittings.

(5) Remove damaged ends resulting from use of pulling grips immediately after pulling conductors. Maintain cable and wire end seals. Do not pull open-ended conductors through conduit. Install conductors continuously from pulling point to pulling point. Splicing between pulling points will not be allowed. Splices shall occur inside pullboxes or handholes.

(6) When splicing is required, join conductors with no-solder pressure connectors. Use no-solder pressure connectors for splicing cables and wires, No. 8 AWG and larger. Leave no sharp points that can pierce taping. Splice and terminate conductors in accordance with conductor manufacturer's recommendations. Submit conductor manufacturer splicing instruction sheets for review.

(7) Trim conductor insulation to conical shape. Roughen conductor insulation before applying splice insulation. Splice insulation includes layers of thermoplastic electrical insulating tape not over 0.007 inch thick conforming to Military Specification MIL-I-24319-C. Apply splice insulation well lapped over and over with same thickness as original insulation.

(8) Coil neatly, at least 5 feet of cable slack near each standard or pullbox.

(G) Conductor Identification. Tags of rigid, non-ferrous material shall be affixed with machine embossed legend on two sides with non-ferrous wire to feeder and branch circuit conductors and conductors in pullboxes and standards. Legend with 1/4 inch letters shall indicate the circuit designation.

(H) Bonding and Grounding.

(1) Provide grounding for entire electric installation in accordance with the NEC and as specified herein. Ground the following:

(a) Electrical service including equipment and enclosures.

(b) Conduit, other conductor enclosures and electrical apparatus.

(c) Equipment with non-current carrying metal parts such as controller cabinets.

(2) **Grounding Electrode.** Furnish copperclad ground rod with 25 ohm maximum resistance to ground. Size of ground rod shall be 3/4 inch by 10 feet minimum. Where resistance exceeds 25 ohm maximum, provide one additional ground rod.

(3) **Manner of Grounding.** Sizes and types of ground conductors, ground clamps, bonding jumpers, conduit, fittings, methods of securing same to obtain electrical continuity and effective grounding, when not indicated, shall be in accordance with NEC requirements.

(4) Install ground wire in non-metallic conduits. Furnish ground wire size in accordance with the NEC. Bond standards and equipment enclosures by utilizing and equipment grounding conductor running in the conduit system.

(I) **Electric Service.** Provide electric power service as indicated. Furnish and install service connections such as conduit, weatherhead, conductors and metering equipment in accordance with HECO standards. Comply with HECO requirements for electrical service.

(J) **Testing.**

(1) Upon completion of this portion of work, and prior to its acceptance by the State, make all required tests and secure all required approval from agencies having jurisdiction. Any deficiencies found shall be rectified and work affected by such deficiencies shall be completely retested at Contractor's expense. Written notification of all proposed tests shall be provided to the Engineer a minimum of 14 days prior to the date of the test.

(2) Perform an operational test after completion of the installation in the presence of the Engineer, to assure proper operation of all items of work. Remove all grounds and shorts. Balance feeder loads.

(3) Measure resistance of grounding system at service and furnish 3 copies of results to the Engineer.

(K) **Restoration of Existing Streets and Other Improvements.** Restore streets, sidewalks, driveways, walkways, curbs, gutters, walls, fences, buildings and all other improvements inside and outside of the right-of-way, publicly or privately owned, which are damaged by the Contractor's operations to their original condition, or better, at no cost to

the State and utility companies. Materials and workmanship shall conform to the applicable sections in these specifications.

651.04 Measurement.

(A) Exterior electrical work will be paid on a lump sum basis. Measurement for payment will not apply.

(B) Utility Company services charges will be paid on a force account basis. Measurement for payment will not apply.

651.05 Payment. The Engineer will pay for the accepted exterior electrical work on a contract lump sum basis. The price includes full compensation for furnishing and installing ductlines, underground conductors and cables, electrical service and distribution equipment, and pullboxes; excavating; pouring concrete; backfilling; furnishing and installing conduit; pole riser; placing aggregate subbase, asphalt concrete base, paving asphalt concrete pavement; restoring sidewalks; salvaging existing materials; making required tests and furnishing labor, materials, equipment, tools, and incidentals necessary to complete the work.

The Engineer will pay for the accepted utility company service charges on a force account basis. Payment will be full compensation of the exact amount as quoted by the utility company. The amounts indicated in the proposal schedule are approximate only. No Contractor's markup will be allowed for this item.

The Engineer will consider additional materials and labor, needed to complete the installation of the system and not shown in the contract as included in the bid price of the various contract items.

The Engineer will pay for each of the pay items when included in the proposal schedule:

Pay Item	Pay Unit
Exterior Electrical Work	Lump Sum
Utility Company Service Charges	Force Account"

END OF SECTION 651

1 Make the following section a part of the Standard Specifications:
2
3

4 **SECTION 679 – WEIGH-IN-MOTION SYSTEM**

5
6 **679.01 Description.** This work includes furnishing labor, materials, tools,
7 machinery and equipment necessary to install and construct an operating Weigh-In-
8 Motion system complete in place according to the contract. The Weigh-In-Motion
9 system includes:
10

11 (A) Trenching, structural excavating, backfilling, restoring work and
12 installing pullboxes.
13

14 (B) Weigh-In-Motion system equipment.
15

16 (C) Concrete foundations, ductlines, cables, wiring, painting and restoration
17 work.
18

19 (D) Coordinating work and arranging for inspection of work with the
20 Engineer and other agencies as required.
21

22 (E) Turning over to the Department a complete and operating Weigh-In-
23 Motion system according to the contract.
24

25 (F) Furnish and install the incidental parts that the contract does not show
26 and that are necessary to complete the Weigh-In-Motion system as though
27 such parts were in the contract.
28

29 (G) Electrical equipment shall conform to the NEMA standards and this
30 contract. Material and workmanship shall conform to the National Electric
31 Code (NEC); National Electrical Safety Code (NESC); General Order Nos. 6
32 and 10 of the Hawaii Public Utilities Commission; the standards of ASTM,
33 ANSI; Electronics Industries Associates (EIA); local power company rules, and
34 local ordinances that may apply.
35

36 **679.02 Materials.**

37
38 (A) Concrete shall conform to Section 601 – Structural Concrete.
39

40 (B) Reinforcing steel shall conform to Section 602 – Reinforcing Steel.
41

42 (C) Steel plate covers and anchor bolts shall conform to ASTM A 36 and A
43 307, respectively. The Contractor shall zinc-coat the anchor bolts if exposed.
44

45 (D) Other materials shall conform to the following:
46

47	Dark Green Enamel Paint	708.03
48		
49	Paint Thinner	708.04
50		
51	Concrete Pull Box	712.06(B)
52		
53	Conduits	712.27
54		

55 Materials will be subject to inspection after delivery to the work site and during
56 installation. Failure of the Engineer to note faulty material or workmanship during
57 construction will not relieve the Contractor of the responsibility for removing or
58 replacing materials at no cost to the State.

59
60 The Fiber Optic Contractor shall be a locally based installer who shall have at
61 least three (3) years' experience, in installing fiber optic cables over \$100,000,
62 specifically for outdoor overhead joint-pole and underground applications. The firm
63 shall also track and document the installation data and tension measurements when
64 installing the fiber optic cables. Any tension measurements, which exceed the
65 manufacturer's recommendation, will be considered means for the cable rejection.
66 The Fiber Optic Contractor shall be fully responsible for the quality and integrity of the
67 installed cable and the operability of the final fiber optic cable product.

68
69 The Engineer may make inspection or sampling of certain materials at the
70 factory or warehouse before delivery to the work site, when required.

71 72 **679.03 Weigh-In-Motion System.**

73 74 **(A) System Introduction.**

75
76 **(1)** The Mainline Sorting System will sort commercial vehicles on
77 the mainline highway upstream from a Department weight enforcement
78 station. Vehicles are sorted as they pass over the Sorter System
79 sensors; vehicles that are potentially in violation of weight regulations
80 will be signaled to exit to the inspection station; vehicles that are in
81 compliance with the regulations will be signaled to bypass the station.

82
83 **(2)** The objective of the Department is to have a fully operational
84 Mainline Sorting System capable of accurately and automatically pre-
85 screening vehicles in motion for enforcement purposes. Based on the
86 weights obtained from the WIM screening, the system shall
87 automatically direct the selected vehicles to the enforcement scales, as
88 illustrated in the contract plans and these specifications.

89
90 **(3)** The Weigh-In-Motion (WIM) system is to be modular for ease of
91 service and upgradeability. Changing or upgrading the functionality at
92 a site shall require only the addition of the electronics modules and

peripheral devices needed for that functionality; existing equipment shall be usable in the upgraded system.

(4) The scope of work is to supply and install the following:

(a) Weigh-In-Motion (WIM) Scales, axle sensors, inductive loops, controller electronics and cabinet.

(b) Industrial Computing Platform (ICP) Web Server and Graphic User Interface (GUI) to allow Weigh Station operators to connect to and operate the Weigh-in-Motion system through internet connectivity on the Operator Workstation Computer.

(c) Operator Workstation Computer

(d) Lane Control Signals (LCS)_ including support structures and sensing loops.

(e) Overview Video Camera (OVC) installation.

(f) Inductive loops only for a Tire Anomaly and Classification System (TACS). The Tire Anomaly and Classification System (TACS) will be installed an integrated into the system at a later date under a separate contract.

(g) Inductive loops, conduits, pole, and pole foundation only for a License Plate Reader (LPR). The License Plate Reader (LPR) will be installed and integrated into the system at a later date and under a separate contract.

(h) Inductive loops, conduits, pole, and pole foundation only for a USDOT Number Reader. The USDOT Number Reader will be installed and integrated into the system at a later date and under a separate contract.

(i) Inductive loops, conduits, pole, and pole foundation only for a Container Reader (CR). The Container Reader will be installed and integrated into the system at a later date and under a separate contract.

(j) ISINC Weigh-in-Motion System Electronics to allow integration to an Intelligent Roadside Operations Computer (iROC). The Intelligent Roadside Operations Computer (IROC) and local database for electronic screening of LPR, USDOT, and CR credentials will be installed and

integrated into the system at a later date under a separate contract.

(k) ISINC Weigh-in-Motion System Electronics to allow Interface to Static Scale for Mainline WIM calibration and Hold and Release functionality. The Static Scale will be installed and integrated into the system at a later date under a separate contract.

(l) Communications wiring and conduit for all equipment.

(m) Power wiring and conduit.

(n) Open/Closed Sign.

(o) Network communications at the Roadside Cabinet including three (3) year data service plan to accommodate Weigh-in-Motion system operations (300 monthly gigabyte allowance and 25Mbps service or equivalent for proper operation of the Weigh-in-Motion System).

(p) Three (3) Year Vendor full maintenance and warranty of the system immediately following project completion.

(5) The purpose of this project is not for the research and development of a mainline sorting system which might perform the objectives as described above. Therefore, the Contractor shall be required to furnish documentation which demonstrates to the satisfaction of the Department that all equipment proposed for use in the system is of standard manufacture; that the manufacturer has had similar equipment available for purchase for not less than ten (10) years and has at least three (3) successful Mainline Sorter System installations (which are not for research and development purposes); and that the manufacturer's WIM equipment has a proven acceptable performance history while in use under conditions similar to those for the intended use.

(6) As a minimum, the equipment documentation provided by the Contractor shall include the following for the Mainline Sorter:

(a) Detailed description of how the system requirements will be met.

(b) Drawings showing control and display panels with descriptions.

185 (c) Description and example screen images of the operator
186 display on the workstation computer.

187
188 (d) Manufacturer's name and model number, supported by
189 descriptive material for (but not limited to) the standard package
190 components with all accessories identified under "Description."
191 Submittals shall be supported by descriptive material, such as
192 catalog cuts, diagrams, and other data published by the
193 manufacturer, to show conformance to specifications and plan
194 requirements; model numbers alone will not be acceptable.

195
196 (e) Document successful interface with TACS System. A list
197 of three (3) references with names, addresses, and persons to
198 contact for similar installations.

199
200 (f) At least three (3) Weigh-In-Motion references and at least
201 three (3) Mainline Sorter System references which have had
202 systems in regular use for a period of not less than five (5) years.
203 The Department reserves the right to request the Owner's
204 evaluation of in-service equipment. These must all be different
205 references.

206
207 **(B) Mainline WIM Sorting System.**

208
209 **(1) Mainline WIM Sorter Operational Overview.**

210
211 (a) Commercial vehicles approaching the weigh station shall
212 be directed into the right hand lane by means of static signing
213 as provided by the Department. A vehicle approaching the
214 weigh station will pass over the Mainline Weigh-In-Motion (WIM)
215 system, which is embedded in the highway approximately 200
216 feet (60 meters) prior to the weigh station exit ramp. The right
217 lane will be equipped with double threshold Bending Plate WIM
218 Scales that meet ASTM E 1318-09 Type III accuracy and
219 reliability. WIM electronics will be located at the roadside
220 adjacent to the WIM scales and sensors and will process the
221 information collected by the in-road equipment.

222
223 (b) The WIM system shall collect axle weight and spacing,
224 vehicle speed, classification, and other relevant data to create a
225 vehicle record. The Overview Video Camera (OVC) imaging
226 equipment will take a side image of the passing vehicle that will
227 be combined with the vehicle record. Based on a comparison of
228 the vehicle record to the parameters set by the station operator,
229 the WIM system will make a sort decision and advise the driver
230 to either exit or bypass the weigh station via the Lane Control

231 Signals (LCS) located on the side of the road. There shall be
232 provision for an operator selectable percentage of non-violating
233 vehicles to be randomly selected from the mainline for visual
234 inspection at the scale station.
235

236 **(2) Mainline WIM Sorter Functional Requirements.**

237 **(a) WIM Scales.**

238
239 i. For WIM operation, the sensor configuration for
240 the mainline drive lane that enters into the weigh station
241 shall be: *“loop -WIM scale – WIM scale – WIM scale -*
242 *WIM scale – loop”*. *The WIM Scales are to be installed*
243 *in a PCC WIM slab approximately 224 feet in length. The*
244 *WIM Scales are to be installed approximately 128 feet*
245 *from the leading edge of the WIM slab and 96 feet from*
246 *the trailing edge of the WIM Slab.*
247

248 ii. There shall be four (4) scale frames which are
249 permanently embedded into the roadway structure on the
250 mainline drive line that enters into the Weigh Station. The
251 four (4) scale weighpad platforms must be mounted and
252 secured within the frames and must be removable for
253 service requirements or replacement. The
254 instrumentation for the weighpad shall be strain gauge
255 load cells mounted directly on the underside of, and
256 integral to the weighpad. The scale frames shall
257 measure 69.63 inch x 25.3 inch x 1.65 inch (1769 mm x
258 643 mm x 42 mm). The WIM scale shall be installed flush
259 with the road surface. The depth of the scale frame
260 excavation shall not exceed 4 inches in the drain area,
261 2.5 inches in the load bearing area.
262

263 iii. The stationary weighpad platform shall be
264 constructed of high strength steel. The weighpad shall
265 operate at high or low speed (from 5 to 200 KPH or 3 to
266 125 MPH). There shall be two (2) 68.9 inch x 20 inch x
267 0.96 inch (1750 mm x 508 mm x 24.5 mm) independent
268 weighpad platforms used per lane of traffic, giving a total
269 weighing surface of approximately 11.5 feet x 20 inches
270 (3.5 m x 0.5 m). The bending plates shall determine
271 individual weights for both the left and right tires of each
272 axle on a vehicle.
273

274 iv. The bending plate shall be no more than 1 inch
275 (25 mm) thick and shall be constructed from a single
276 piece of metal with no welding or bolting. The individual

weight of the bending plate or frame shall not exceed 265 pounds nor shall the combined weight of a single bending plate and its frame exceed 505 pounds.

v. The WIM scales shall operate properly in a temperature range of -40°F to +176°F (-40°C to +80°C). The WIM scales and their frames shall be rust proofed. All installation hardware shall be either stainless steel or rust proofed. All surface mounting bolt and service holes shall be sealed.

vi. Construction and total lane closure time shall not exceed eight (8) hours duration (consecutive closure time), including the time required for grinding and scale installation.

vii. Replacement of a weighpad shall be less than one (1) hour (not including traffic control).

viii. The WIM scales and frames shall be grounded with ground rods. The signal processing electronic components/modules shall be protected against transient over-voltages such as lightning. The signal cable shall be a 24 AWG 4 conductor shielded cable and sealed to the scale to prevent water intrusion into the measuring channels.

ix. The accuracy of the Bending Plate weighpads shall be in conformance with the ASTM E 1318 "Standard Specifications for Highway Weigh-In-Motion (WIM) Systems with User Requirements and Test Method" performance requirements for a Type III system on the for double threshold configuration (four (4) weighpads per lane).

x. Prior to installation of the weighpad platform, the Contractor shall ensure the roadway meets the requirements of Section 6 of ASTM E 1318-09. If necessary, to meet the requirements, the Contractor shall grind the concrete roadway beginning 200 feet (60 meters) prior to the scale location and ending 100 feet (30 meters) after the scale location, for a total of 300 feet (90 meters), with a minimum 36 inch (90 cm) blanket grinder.

323 **(3) Detector Loops.**
324

325 **(a)** The Sorter system shall use inductive loops to detect the
326 presence, entry or exit of a vehicle in support of WIM and AVC
327 operations.

328
329 **(b)** The loops located on the mainline in the PCC WIM Slab
330 will be preformed loops that are placed on the road base prior to
331 pouring the concrete

332
333 **(c)** loops that are located on the Asphalt sections of roadway
334 will be sawcut and sealed with approved sealants

335
336 **(d)** Sizes of the loops and loop materials for this project are to
337 be provided by the Weigh-in-Motion vendor to ensure
338 compatibility with the system.

339
340 **(e)** Loop wire must be one (1) conductor, 14 AWG, IMSA 51-
341 5. Loop leads must be two (2) conductor, 14 gauge, IMSA 50-2
342 cable.

343
344 **(f)** All saw-cut loops shall be sealed with HDOT approved
345 loop sealant.

346
347 **(g)** For each CMS there shall be a detector loop. The
348 Mainline WIM system shall use the signals from these detector
349 loops to control the timing of the message displayed by each
350 LCS such that the correct message is displayed to each vehicle.

351
352 **(4) iSINC Mainline Sorter Electronics.**
353

354 **(a)** The Mainline Sorter System Electronics shall be located
355 next to the WIM scales in a roadside cabinet. The System
356 Electronics shall be responsible for creating vehicle records and
357 formatting the truck data to enable a user to remotely view the
358 vehicle records. The WIM interface electronics will be a stand-
359 alone system with the capability to collect and interpret the
360 signals from the WIM Scale.

361
362 **(b)** All material necessary for setup and operation of the
363 system must be provided including all wiring and cabling.

364
365 **(c)** The system must be provided with the required software
366 pre-loaded. The software must automatically execute when the
367 system is powered up.
368

(d) The electronics must be modular to facilitate easy maintenance, troubleshooting and in-field servicing. For ease of maintenance, each type of input and output device shall interface to a system electronics printed circuit board interface module. All interface modules shall feature self-testing and built-in fault diagnosis. All sensor modules shall be field replaceable and slot mounted in a system electronics sub-chassis.

(e) The system electronics shall be available in optional CE compliant configurations. These configurations shall satisfy the following European Union directives:

i. Low Voltage 2006/95/EC

ii. Electromagnetic Capability Directive
2004/108/EC

iii. Restriction of Hazardous Substances Directive
2002/95/EC

iv. Waste Electronic and Electrical Equipment
Directive 2002/96/EC

(f) The system shall be of a durable, industrial design and construction, and enable continuous operation, with automated start-up in the event of a power outage. For reliability, modularity and ease of communication with any additional system components that may be added at a future date, system electronics modules shall communicate over a rugged CAN Bus system (Controller Area Network protocol).

(g) The electronics shall include interfaces to the following components:

i. WIM Sensors including Piezo, Bending Plate, Single Load Cell, Kistler Lineas Quartz

ii. Axle Sensors including Piezo and DYNAX

iii. Safety and Credentialing Systems including OVC, LPR, USDOT, CR, and TACS

iv. Loops

v. Offscale Detectors

vi. Communications System

(h) The roadside electronics shall provide a facility for viewing vehicle records and sensor diagnostics over either a direct computer connection or a telecommunications link.

- a. All components of the electronic system, including inductive loop detectors, will contain electrical over-voltage protection to prevent damage from electrical surges, spikes and lightning.

(i) The System Electronics shall provide the following functions:

- i. Insert sequence numbers for vehicle records for tracking purposes.
- ii. Perform WIM operation.
- iii. Weigh all vehicles traveling over WIM scales.
- iv. Classify all vehicles traveling on all instrumented lanes of the highway.
- v. Perform weight compliance analysis on vehicles in accordance with department of agency regulations.
- vi. Perform sorter operation in accordance with decisions based on weight compliance analysis or other weight specific errors or warnings (straddling lane, improper maneuver, sudden speed change, etc.).
- vii. Capture images for all vehicles.
- viii. Filter out all non-interesting images
- ix. Format images and data for ICP Web server.
- x. Perform data collection, data storage, file management and report generation functions for collected vehicle information.

(j) The system shall include a data downloading system to allow collected vehicle data to be retrieved either remotely or on site.

461 **(k)** The Mainline WIM Sorting System shall be provided with
462 a secure, weather resistive roadside enclosure to house the
463 System Electronics, the WIM computer and its peripherals and
464 the side image camera equipment.

465
466 **(l)** All wires from scales, offscale sensors, axle sensors,
467 loops, etc. shall be terminated on terminal strips. The terminal
468 strips shall be identified by terminal strip number and screw
469 connection number. These terminal strips shall be readily
470 accessible. All cables shall be long enough to easily reach these
471 terminal strips. Terminal strips, splices, or other type of
472 connections prior to these standard terminal strips shall not be
473 allowed except for splicing of a loop to a shielded twisted loop
474 lead.

475
476 **(m)** All AC power connections shall be shielded to prevent
477 electrical shock.

478
479 **(n)** The System Electronics shall meet the following
480 requirements:
481

System	Low Temperature: -40 degrees C Cold start
	High Temperature: +75 degrees C
	Humidity: 95% relative humidity, non-condensing
	Processor: 32-bit RISC architecture
	Memory: 32 MB RAM, up to 4 GB Storage
	CAN Bus environment for sensor and control configuration
	Non-volatile storage for vehicle information to prevent data loss during power outages and to retain sensor module configuration
Communications	Industry standard CAN Bus environment
	USB interface
	Ethernet interface
	Remote administration via Telnet Secure Shell (SSH)
	Remote file download via Secure FTP
Software	Sensor inputs include Single Load Cell, Bending Plate, Intercomp Slow Speed WIM, Kistler Lineas Quartz, DYNAX, Piezo, Loops and Serial and Digital Devices
	Sensor inputs from WIM Scale, loop and piezo sensors
	Vehicle Classification performed by means of user-defined classification scheme
	Weight Compliance performed by means of user-defined weight compliance scheme
	Records data logs on operational status, power supply condition and system activity
Maintenance	
	Telnet over an Ethernet Interface
	Interface cards shall be hot-swappable (i.e., cards can be safely removed or replaced while the system is operating and powered)
	System configuration and fault diagnosis operations
Axle Sensor Interface Axle Sensor Interface (WIM and Piezo)	Adjustable threshold for detecting axles
	Capable of automatic temperature compensation
	Capable of autocalibration
Digital I/O Interface	Report on rising edge, falling edge or both
	Adjustable input debounce
	Control output state, single pulse, or square wave
	Adjustable timeout on inputs

(5) Lane Control (LCS).

(a) The Lane Control System (LCS) shall consist of a “Red X and Green Arrow” display and inductive detector loops as required for LCS control. The LCS shall be installed along the side of the roadway approximately 200’ downstream from the Mainline WIM Sorter System. The LCS system shall be controlled by the roadside WIM electronics. The LCS shall direct vehicles to enter the weigh station or bypass the station, based on the results of the mainline sort decision. The LCS system shall be controlled such that it ensures that the message display is synchronized according to the detection and tracking of a vehicle passing over the LCS loops. In this way, only the vehicle for which the message is intended will see the message on the LCS.

(6) Overview Camera.

501
502 **(a)** The System shall include an Overview Camera imaging
503 system to record images of vehicles for identification purposes.
504 The imaging system shall consist of camera capable of taking
505 pictures in all lighting conditions and the image processing
506 electronics to record the image of each vehicle that passes
507 through the system. The overview image camera shall be
508 mounted alongside the roadway on the mainline positioned to
509 obtain the best possible images, detailing their cab and side.
510 The images shall be linked with the vehicle records of
511 commercial vehicles; non-commercial images shall be
512 discarded. The camera shall be capable of full color images
513 during daytime operation, and monochrome (black & white)
514 near-infrared images during nighttime and low light operation.
515 The imaging system electronics shall be located in the roadside
516 System Electronics enclosure.

517
518 **(b)** The Imaging System shall consist of the following system
519 components:

- 520
521 i. Color and low light monochrome (black & white)
522 video camera.
523
524 ii. Illuminator system.
525
526 iii. Video capture system.
527

528 **(7) Operator Display.** The Vendor shall supply a workstation
529 computer and software capable of showing a real-time listing of vehicle
530 records via a network connection.

531
532 **(a) Vehicle Display.**

533
534 i. The workstation shall receive the vehicle records
535 from the Mainline WIM electronics and display vehicle
536 records in a Vehicle Display Window. The Display shall
537 be a listing of the records for each vehicle which will
538 include:

- 539
540 (i) thumbnail image of the vehicle
541
542 (ii) The Vehicle record number.
543
544 (iii) Time and date.
545
546 (iv) Vehicle class.

- (v) Gross vehicle weight.
- (vi) Vehicle length.
- (vii) Speed.
- (viii) Maximum allowed GVW for the vehicle class.
- (ix) Individual axle weights.
- (x) Axle spacing.
- (xi) Axle groupings
- (xii) Axle group weights.
- (xiii) The sort decision.
- (xiv) OVC image.
- (xv) A color indicator for whether the vehicle is compliant (green) or in violation (red)
- (xvi) If the vehicle is in violation an error in measurement has occurred, a message indicating the violation or error.

ii. The operator shall be able to select any vehicle record displayed to obtain a more detailed display which contains all the information that the system has stored in the vehicle record, which will include the information above in table form, plus individual wheel weights, maximum allowed weights for each axle, all violations and error messages and all images associated with the vehicle record displayed at full size.

(b) Sorting Controls.

i. The workstation display shall have controls to allow the operator to be able to set the sorting threshold used at the Mainline WIM Sorter. The sorting threshold determines at what percentage of legal weight a vehicle must be measured to be required to report. In this way, the operator may set the Mainline WIM Sorter to bring in

the maximum number of trucks that the station can process, without exceeding the station capacity.

ii. The workstation display shall have controls to allow the operator to select a percentage of non-violating vehicles to be randomly selected from the mainline for visual inspection at the scale station. This allows enforcement officials to perform random safety checks on otherwise compliant trucks.

(c) **LCS Controls.** The workstation display shall have controls to allow the operator to manually select the “Red X Green Arrow” displayed on the LCS.

(8) Virtual Weigh Station.

(a) The Mainline Sorter System shall be able to function as a Virtual Weigh Station, transmitting the resulting vehicle record data over a network connection for display to one (1) or more authorized users at any location.

(b) The display for a single user connected to the Virtual Weigh Station via a network connection shall show a list of vehicle records. Each vehicle record shall contain the following information:

- i. A thumbnail image of the vehicle.
- ii. The vehicle record number.
- iii. Data and time.
- iv. The vehicle class.
- v. Speed.
- vi. Length of the vehicle.
- vii. Gross Vehicle Weight.
- viii. Individual axle weights.
- ix. Axle spacing.
- x. Axle groupings.

- xi. Axle group weights.
- xii. OVC image.
- xiii. A color indicator for whether the vehicle is compliant (green) or in violation (red)
- xiv. If the vehicle is in violation an error in measurement has occurred, a message indicating the violation or error.

(c) The user shall be able to select any vehicle record in the listing and open a detailed display which shows all data recorded for that vehicle, including all the data above plus individual wheel weights, maximum allowed weights for each axle, all violations, and the full-size image in the vehicle record.

(d) When viewing a detailed vehicle record, user shall be able to step forward or back to the next record in the system memory.

(9) Data Collection. The Mainline System shall also perform all functions of a Data Collection System, collecting Vehicle Record Data from the site in a format that may be used for analysis of system operation and traffic patterns. The data shall be available for collection over a telecommunications connection. All vehicle shall be stored as individual vehicle records in REV 10 Binary File Format.

(C) Conduits and Pull Boxes.

(1) All cables shall be in conduits unless specifically approved by the Engineer. All pull boxes are to meet Department specifications.

(2) All materials shall comply with the "National Electrical Code" and the current Department Standard Specifications for Highway Construction, "Highway Division Standard Drawings for Design and Construction", and special requirements by Department weigh in motion and automatic vehicle identification system specifications. Duct seal shall be used to seal all conduits in the cabinets and in all junction boxes. All conduits shall have a polyethylene pull string with at least 210 pounds break strength left in place at completion of construction.

(3) Separate conduits shall be used for AC/DC power and low voltage signal cables. Low voltage signal cables shall include video, digital communication, sensor signal cable, and sensor excitation

cables where voltage is under +/- 20 volts DC. Conduits for video and RF cables shall be of a large enough size to accommodate the maximum bend radius using factory 90 degree "bends".

(4) All cables shall be in conduits unless specifically approved by the Department.

(D) WIM Standards.

(1) Each standard shall be furnished with anchor base; uniform continuously tapered steel shaft; anchor bolts and nuts; grounding lug; cast pole top cap, mast arms and mounting flange plate where indicated, handhole and handhole cover; and other associated hardware necessary to make each WIM standard complete. Each assembly shall have no rough edges or surfaces, depressions or other defects.

(2) Standards shall be designed to support the equipment mounted on the pole shafts and mast arms. Equipment mounting heights shall be as indicated on the contract documents and in accordance with WIM system manufacturer recommendations.

(3) Shaft shall be constructed of No. 10 gage minimum, hot-rolled sheet steel conforming to ASTM a 1011 or ASTM A 595. Silicon content shall be kept to less than 0.06 percent, and boron shall not be added. Transverse seams shall be perpendicular to shaft axis. Reinforce transverse seams with internal sleeves welded in place. Shaft shall have reinforced opening for a handhole located approximately 9 inches above the bottom surface of anchor base plate. Reinforced opening shall be furnished with a gasket, cover plate and non-slip fastener. Handhole frame shall be tapped for cap screws to secure cover plate.

(4) Provide J-hook wire support, welded at top of shaft. Top of shaft shall be capped with cast pole top, secured in place with set screws.

(5) **Anchor Base.** Single-piece steel anchor base of sufficient size, shape, and strength to support standard shall be secured to lower end of shaft by two (2) continuous electric arc welds. Shaft shall telescope with base. One (1) weld shall be on inner portion of base at end of shaft and another weld shall be on outside at top of base. An approximately 2-inch separation shall be provided between the two (2) welds. Base shall have four (4) holes sized to accommodate anchor bolts.

(6) **Tapered Mast Arm.** Mast arm shall be made from material from single length of No. 10 gage minimum hot rolled sheet steel conforming

to ASTM A 1011 or ASTM A 595. Silicon content shall be kept to less than 0.06 percent, and boron shall not be added. Large end of mast arm shall telescope with flange plate of thickness recommended by manufacturer. Flange plate shall be welded to mast arm by two (2) continuous electric arc welds. One (1) weld shall be on outer portion of plate next to shaft and another weld shall be on inner portion at end of tubular cross section. Four (4) holes in flange plate shall match four (4) tapped holes in mounting plate on pole.

(7) Anchor Bolts. Each pole shall have a minimum of four (4) steel anchor bolts, with each bolt fitted with two (2) hex or heavy hex nuts. Each anchor bolt shall have "L" bend or plate washer welded to bottom. Anchor bolts shall be threaded at top end. Bolts shall be of strength, size, and length recommended by manufacturer and as specified in Subsection 718.01 – Standard Fasteners, to support pole shaft, mast arm, and WIM equipment.

(8) Zinc-Coating. Steel and iron parts of base, shaft, and mast arm shall be zinc-coated in accordance with AASHTO 232. Washers and nuts may be hot-dip zinc-coated or electro-zinc-coated.

(9) Standard Specifications. Design of WIM standards and appurtenances shall conform to *AASHTO LFRD Specifications for Structural Supports for Highway Signs, Luminaires, and Traffic Signals*, 1st Edition, with 2017 Interim Revisions.

(10) Certification and Mill Test Reports. Certification and mill test reports shall be submitted with the following information:

(a) List of component parts including the following:

i. Description of each part.

ii. Materials manufacturing location (including ASTM number where applicable).

iii. Certificate of compliance.

(b) Shop drawings accompanied by complete and detailed engineering computations that justify selection of dimensions and material. Hawaii Licensed Professional Structural Engineer shall certify computations.

(c) Copy of mill test report for structural members (posts and beams), including physical and chemical descriptions of material incorporated.

777
778 **(E) Conductors.**
779

780 **(1) Conductors.** All conductors shall be copper, No. 12 AWG
781 minimum. No. 8 AWG and larger diameter shall be stranded; No. 10
782 AWG and smaller shall be solid. Do not provide wires and cables
783 manufactured more than twelve (12) months prior to the date of delivery
784 to the site. Aluminum conductors shall not be provided.
785

786 **(2) Color Coding.** Provide for feeder and branch circuit
787 conductors. Color shall be green for grounding conductors and white
788 for neutral conductor. Color of ungrounded conductors shall be as
789 follows:
790

791 **(a)** 120/240 volt, single phase.
792

793 **i.** Phase A – black
794

795 **ii.** Phase B – red
796

797 **(3) Insulation.** Type XHHW or RHW-2 unless otherwise specified.
798

799 **(4) Bonding Conductors.** Solid bare copper wire for sizes No. 8
800 AWG and smaller diameter; Class B, stranded bare copper wire for
801 sizes No. 6 AWG and larger diameter.
802

803 **(5) Splices.** Any splices necessary shall be compression type,
804 mechanically firm and made only in wireway, pull boxes or handholes.
805 Splices shall be sufficiently taped and coated to provide a completely
806 waterproof permanent joint. An approved plastic electrical tape and
807 waterproof coating shall be used. A minimum of two (2) layers of tape
808 shall be applied.
809

810 **(6) Electrical Tapes.**
811

812 **(a) Insulating Tape.** UL 510, plastic insulating tape,
813 capable of performing in a continuous temperature environment
814 of 80 degrees C (80°C).
815

816 **(b) Other Tapes.** Tapes shall be UL listed for electrical
817 insulation and other purposes in wire and cable splices.
818 Terminations, repairs, and miscellaneous purposes, electrical
819 tapes shall comply with UL 510.
820

821 **(F) Fiber Optic Cable.** The fiber optic cables will consist of multi-mode
822 fibers. Furnish and install fiber optic cable suitable, and meeting standards, for

underground installations. The fiber optic cables shall meet the following specifications:

(1) Stranded Loose Tube Cables. General Considerations. The cable shall meet the requirements of the United States Department of Agriculture Rural Utilities Service (RUS) 7 CFR 1755.900 and the ANSI/ICEA Standard for Fiber Optic Outside Plant Communications Cable, ANSI/ICEA S-87-640-1992.

(2) Multi-Mode Cables. The multi-mode fiber utilized in the cable specified herein shall meet EIA/TIA-492AAA-1989, "Detail Specification for 62.5 um core diameter 125 um cladding diameter Class 1a multi-mode, graded index optical waveguide fibers."

(a) Core Diameter: 62.5 ± 3.0 um

(b) Cladding Diameter: 125 ± 2.0 um

(c) Core to Cladding Offset: ≤ 3.0 um

(d) Cladding Non-Circularity: ≤ 2.0 percent

(e) Core Non-Circularity: ≤ 5 percent

(f) Coating Diameter: 245 ± 10 um

(g) Colored Fiber Diameter: nominal 250 um

(h) Attenuation Uniformity: No point discontinuity greater than .020 dB at either 850 um or 1300 nm.

(i) Refractive Index Profile: Graded index

(j) Numerical Aperture: 0.275 ± 0.015

(k) The coating shall be a dual layered, UV cured acrylate applied by the fiber manufacturer. The coating shall be mechanically strippable.

(3) Fiber Specification Parameters.

(a) Required Fiber Grade. Maximum individual fiber attenuation.

867 **(b) Multi-Mode.** The minimum normalized bandwidth of
868 multi-mode optical fibers shall be ≥ 160 MHz-km at 850 nm and
869 ≥ 500 MHz-km at 1300 nm.
870

871 **(c)** All optical fibers shall be proof tested by the fiber
872 manufacturer to a minimum load of 0.7 GN/m² (100 kpsi).
873

874 **(4)** Optical fibers shall be inside a loose buffer tube. The nominal
875 outer diameter of the buffer tube shall be 3.0 mm.
876

877 **(a)** Each buffer tube shall contain up twelve (12) fibers.
878

879 **(b)** The fibers shall not adhere to the inside of the buffer tube.
880

881 **(c)** Each fiber shall be distinguishable by means of color
882 coding in accordance with TIA/EIA-598-A, "Optical Fiber Cable
883 Color Coding".
884

885 **(d)** The fiber shall be colored with ultraviolet (UV) curable
886 links.
887

888 **(e)** Buffer tubes containing fibers shall be color coded with
889 distinct and recognizable colors in accordance with TIA/EIA-
890 598-A, "Optical Fiber Cable Color Coding".
891

892 **(f)** Buffer tube colored stripes shall be inlaid in the tube by
893 means of co-extrusion required. The nominal stripe width shall
894 be one (1) mm.
895

896 **(g)** In buffer tubes containing multiple fibers, the colors shall
897 be stable across the specified storage and operating
898 temperature range and not subject to fading or smearing onto
899 each other or into the gel filling material, colors shall not cause
900 fiber to stick together. The buffer tubes shall be resistant to
901 external forces and shall meet the buffer tube cold end and
902 shrink back requirements of 7 CFR 1755.900.
903

904 **(h)** Fillers may be included in the cable core to lend
905 symmetry to the cable cross section where needed. Fillers shall
906 be placed so that they do not interrupt the consecutive
907 positioning of the buffer tubes. In dual layer cables, any filler
908 shall be placed in the inner layers. Fillers shall be nominally 3.0
909 mm in outer diameter.
910

911 **(i)** The central anti-buckling member shall consist of a
912 dielectric, Glass Reinforced Plastic (GRP) rod. The purpose of

the central member is to prevent buckling of the cable. The GRP rod shall be over coated with a black colored thermoplastic when required to achieve dimensional sizing to accommodate buffer tubes/fillers.

(j) Each buffer tube shall be filled with a non-hygroscopic, non-nutritive electrically non-conductive, homogenous gel. The gel shall be free from dirt and foreign matter. The gel shall be readily removable with conventional nontoxic solvents.

(k) Buffer tubes shall be stranded around the dielectric central member. Water blocking yarns shall be applied longitudinally along the central member during stranding.

(l) Two (2) polyester yarn binders shall be applied contrahelically with sufficient tension to secure each buffer tube layer to the dielectric central member without crushing the buffer tubes. The binders shall be non-hygroscopic, non-wicking and dielectric with low shrinkage.

(m) For single layer cables, a water blocking tape shall be applied longitudinally outside of the stranded tubes/fillers. The tape shall be held in place by a single polyester binder yarn. The water blocking tape shall be non-nutritive to fungus, electrically conductive and homogenous. It shall also be free from dirt and foreign matter.

(n) The cable shall contain at least one (1) ripcord under the sheath for easy sheath removal of all-dielectric cable. The cable shall contain at least one (1) ripcord under the inner sheath and under the steel armor for armored cable. The ripcord color shall be orange for non-armored sheaths.

(o) Tensile strength shall be provided by dielectric yarns. The high tensile strength dielectric yarns shall be helically stranded evenly around the cable core.

(p) All dielectric cables shall be sheathed with Medium Density Polyethylene (MDPE). The minimum nominal jacket thickness shall be 1.4 mm. Jacketing material shall be applied directly over the tensile strength members and water blocking tape. The polyethylene shall contain carbon black to provide ultraviolet light protection and shall not promote the growth of fungus.

(q) The MDPE jacket material shall be as defined by ASTM D 1248, Type II, Class C and Grade J4, E7, and E8. The jacket or sheath shall be free of holes, splits, and blisters. The cable jacket shall contain no metal elements and shall be of a consistent thickness.

(r) Cable jackets shall be marked with manufacturer's name, sequential meter or foot marking month and year of manufacture, and a telecommunication handset symbol, as required by the National Electrical Safety Code (NESC). The actual length of the cable shall be with the exception 0/+1 percent of the length markings. The print color shall be white, with the exception that cable jackets containing one (1) or more coextruded white stripes shall be printed in light blue. The height of the markings shall be approximately 2.5 mm.

(s) The maximum pulling tension shall be 2700 N (608 Lbft) during installation (short term) and 890 N (200 Lbft) long term installed.

(t) The shipping, storage, and operating temperature range of the cable shall be -40°C to +70°C.

(5) Quality Assurance Provision.

(a) All cabled optical fibers > 1000 meters in length shall be one hundred percent (100%) attenuation tested. Attenuation of each fiber shall be provided with each cable reel.

(b) The cable manufacturer shall be ISO 9001 registered.

(6) Packaging.

(a) Top and bottom ends of the cable shall be available for testing.

(b) Both ends of the cable shall be sealed to prevent the ingress of moisture. Each reel shall have a weather resistant reel tag attached identifying the reel and cable.

(c) The reel tag shall include the following information:

- i. Cable Number.
- ii. Gross Weight.

- 1004 iii. Shipped Length in Meters.
1005
1006 iv. Job Order Number.
1007
1008 v. Product Number.
1009
1010 vi. Date Cable Tested.
1011
1012 (d) Each cable shall be accompanied by a cable data sheet.
1013 Cable data shall include manufacturer number, billable length,
1014 bandwidth specs and measured attenuation of each fiber.
1015
1016 **(G) Warning Tape.** Pre-printed polyethylene tape marked with "CAUTION
1017 BURIED ELECTRICAL LINE BELOW," 4 mil thick, detectable foil backed, 3"
1018 minimum width.
1019
1020 **(H) Duct Seal.** Pliable, non-toxic material used for application around and
1021 in conduits and to minimize moisture and rodent/insect infiltration. Must be re-
1022 enterable material allowing form removal/reapplication after initial installation.
1023 Non-drying, non-cracking, non-corrosive material that will not adversely affect
1024 raceways and conductors. Provide duct seal at all duct entries in handholes,
1025 apparatus, and risers.
1026
1027 **(I) Ground Rods.** Copper clad steel, 3/4" x 10' long minimum.
1028
1029 **(J) Construction Requirements.**
1030
1031 **(1) Equipment List and Drawings.** The bidder shall submit the
1032 equipment list according to Subsection 106.13 – Substitution of
1033 Materials and Equipment After Bid Opening.
1034
1035 **(2)**Upon completion of the work, submit an 'As-Built' or corrected
1036 plan showing in detail the construction changes.
1037
1038 **(3) Excavation and Backfill.** Excavation and backfill shall conform
1039 to Section 204 – Excavation and Backfill for Miscellaneous Facilities.
1040
1041 **(4) Installation.**
1042
1043 **(a) Standards.** Install each WIM standard with its shaft
1044 precisely vertical on a concrete foundation. Locations of
1045 standards shown in the contract are approximate. The Engineer
1046 will decide the exact locations in the field.
1047
1048 **(b) Pole Mounted Equipment.** Assemble the equipment to
1049 give the arrangement shown in the contract and in accordance

with manufacturer recommendations. Plumb or level the members, arrange the members symmetrically, and assemble the members securely. Installation shall be such that the Contractor conceals the conductors within the standards and mounting assemblies as much as possible.

(c) Roadside Enclosure. Mount the cabinet according to the contract. Assemble, wire, and house the controller and auxiliary equipment specified in the cabinet and in accordance with manufacturer recommendations.

(d) Vehicle Detectors. Vehicle detectors shall be inductive loop detectors installed according to details shown in the contract. The saw cut groove shall be air blown to remove debris before inserting the loop cable. The loop cable shall be continuous within the roadway. Splice in the pullbox. Fill the saw cut groove with epoxy sealer or hot applied rubberized sealant. As accepted by the Engineer, the Contractor may use a sealant designed for use as a protective seal for traffic inductive loop detectors installed in asphalt concrete or concrete pavements.

(e) Foundations and Pullboxes. Construct the foundations and boxes required carefully at the locations designated. Pour the foundations and boxes in areas that the Contractor has carefully excavated to receive the foundations and boxes. Construct each unit as detailed in the contract and connect each unit properly with the facilities of which each unit is a component part.

Mix, place, and cure the concrete according to Section 601 – Structural Concrete, and Section 503 – Concrete Structures. The Engineer will allow hand mixing.

Set the anchor bolts or the foundations to fit the bases of the standards to be installed.

Give the pullbox frames and covers two (2) coats of asphaltic base paint after installation.

(f) Conduits. Conduits shall be concrete encased, PVC Schedule 80.

Install the ducts to drain towards either one (1) or both pullboxes, manholes, or WIM standard foundation.

1096 Make directional changes in the conduits, such as bends
1097 and changes to clear obstructions with curved segments using
1098 accepted deflection couplings or with short lengths of straight
1099 ducts and couplings. The deflection angle between two (2)
1100 adjacent lengths of ducts shall not exceed 6°. The bends shall
1101 not have a radius of less than twelve (12) times the nominal size
1102 of the conduit. The Contractor may use factory-made ells.

1103
1104 Cut the rigid PVC conduits with a hacksaw. Square and
1105 trim the ends after cutting to remove rough edges. The
1106 connections shall be of the solvent weld type. Make the solvent
1107 weld joints according to the conduit manufacturer's
1108 recommendations and as accepted.

1109
1110 Use the rigid PVC conduit for drilling or jacking.

1111
1112 Thread the PVC fittings for connecting PVC conduit to
1113 rigid metal conduit on the metal conduit side.

1114
1115 Seal the ends of the duct with plugs at the end of each
1116 day of work, whenever problems interrupt the duct installation
1117 work and whenever ducts are subject to submergence in water.

1118
1119 Keep the conduits clean during construction.

1120
1121 Use only hand shovels in compacting concrete
1122 encasements. Cure the concrete for at least seventy-two (72)
1123 hours before permitting vehicular traffic to run over the concrete.

1124
1125 Provide each conduit run with a No. 10 gauge flexible,
1126 zinc-coated pull wire extending through its entire length. Double
1127 an addition two (2) feet back into the conduit at each end of the
1128 run. Conduits and sleeves entering pullboxes shall end flush in
1129 the wall with ends ground smooth. Plug the conduits and
1130 sleeves temporarily.

1131
1132 Ends of conduits runs shall extend at least twenty-four
1133 (24) inches past the face of curb or edge of pavement unless the
1134 ends end in the pullboxes. Locate the ends accurately by
1135 special markers, markings on curb, or as specified by the
1136 Engineer. Show these locations on the 'As-Built' plans.

1137
1138 The completed duct lines shall be subject to a field test.
1139 Pass a bullet-shaped test mandrel about eight (8) inches long
1140 with a diameter 0.5 inch less than the inside diameter of the
1141 ducts through the entire length of each duct run. The Engineer

will consider scouring found on the mandrel deeper than one thirty-secondth inch (1/32 inch) an indication of burrs and/or obstructions in the duct run. Normal abrasion between the duct line and bottom of mandrel is not an indication of burrs and/or obstructions in the duct run. Remove such burrs and/or obstructions. Pass the test mandrel through again. Repeat the process until the Contractor obtains a satisfactory result.

Use galvanized rigid steel or Schedule 80 PVC conduits for all exposed construction except risers for communications cables. Use only Schedule 80 PVC conduits for risers for communication cables.

(g) Wiring. Wiring shall conform to the appropriate articles of the NEC and NESC. Arrange the wiring within cabinets, WIM equipment, WIM standards and pullboxes neatly. Encase the wiring installed underground in conduits. Before installing the wires and cables in conduits, pull a wire brush, swab and mandrel through each conduit for the removal of extraneous matter and verification of the absence of obstructions and debris from the conduit system.

Pull the cables directly from their cores or reels into the conduits. Do not pull off and lay the cables on the ground before installation. Make the pulls in one (1) direction only. Lubricants used shall e as recommended by the cable manufacturer or accepted by the Engineer. Leave the wires or cables under tension nor tight against bushings or fittings.

Remove the damaged ends resulting from the use of pulling grips soon after pulling the cable. Maintain the cable end seals. Do not pull the open-ended cables through the conduits. Cables shall be continuous from pulling point to pulling point. The Engineer will not permit splices. Make the splices, taps, and terminations with pressure-indented connectors or lugs as appropriate or as specified herein. Tape or seal the ends of the spare conductors as accepted.

Join the conductors by a 'western union' type splice. Use the connectors for splicing conductors No. 8 AWG, or larger. Solder the splices by the pouring or dipping method.

Pencil the conductor insulation well, trim the conductor insulation to conical shape, and roughen the conductor insulation before applying splice insulation.

Splice insulation includes layers of thermoplastic electrical insulating tape not over 0.007inch thick applied to a thickness equal to and well lapped over the original insulation. The splice insulation shall conform to Federal Specifications MIL-I-7798. Leave at least two (2) feet of slack for each conductor at each splice.

Furnish the cables on reels and handle the cables with great care to avoid damage to the conductors or the jacket.

Install the communications cable, connect the communication cable to terminals, and wire the communication cable to terminals, and wire the communication cable to the proper equipment to produce a closed loop network suitable for operating within the WIM system. Able runs shall be continuous between equipment cabinets without splices.

Pull the cable in the conduit with a cable grip designed to provide a firm hold on the exterior covering of the cable. Pull the cable with a minimum dragging on the ground or pavement. Use powdered soapstone, talc, or other accepted lubricants to ease the pulling of the cable.

(h) Fiber Optic Cable. The qualified Fiber Optic Contractor, shall install the new fiber optic cable in conduits as shown on the plans.

Fiber optic splice locations are permitted only at splice points where splice cabinets are shown on the plans. Fiber optic fibers shall be spliced in every cabinet location, and it is the responsibility of the Fiber Optic Contractor to maintain a continuous run throughout the system.

Provide documented historical cable pulling data indicating tensile pressure exerted on the cable during the installation. All fibers shall be spliced at camera cabinets, hubs, and splice cabinets and shall have no more than .07 dB loss per splice based on the appropriate system operating wavelength. As part of the final testing and acceptance prior to final terminations to WIM equipment, submit OTDR readings to the Engineer for review.

All necessary equipment and plug-in, fiber optic pigtails, fittings, enclosures, and work to complete an operational system shall be furnished and installed by the Contractor, unless otherwise indicated, at no additional cost.

(i) Bonding and Grounding. Make the metallic cable sheaths, conduits, and standards mechanically and electrically secure to form a continuous system. Ground the system effectively. Bonding and grounding jumpers shall be No. 8 AWG copper wire or equivalent copper strap of the same cross-sectional area.

Bond the standards by the neutral wires at the service points as required under the Code, except that grounding conductors shall be No. 6 AWG or equal.

Install a copper-clad steel or pure copper ground rod 3/4 inch diameter by ten (10) feet long alongside each WIM standard and roadside enclosure concrete base.

The Contractor shall connect them with No. 6 AWG wire to the No. 8 AWG ground wire loop and power system neutral.

(K) Restoring Pavements and Other Improvements. Restore the existing pavements and other improvements such as driveways, sidewalks, curbs and gutters disturbed by excavation to their original condition according to the contract. Materials used for restoration work shall be equal to or better in quality than the materials the Contractor will replace, and matching in thickness, texture, and color whenever applicable. The grades of the restored surfaces shall conform to the existing grades.

(L) System Acceptance.

(1) The system shall be accepted subject to fulfilling the following conditions:

(a) System review.

(b) Acceptance tests (meeting WIM accuracy on a weekly basis).

(c) Training.

(2) System Review.

(a) The WIM Vendor shall submit three (3) copies of a system layout for each individual site. These layouts shall be submitted to the Department for review. Approval shall be either an official from the Department or a designate.

(b) A preliminary on-site meeting shall be held for each site to discuss contractors' plans for the routing of conduits, cables, and placement of equipment.

(3) Acceptance Tests. The system, all-inclusive as contracted, shall be designed, built and tested by the Vendor, and as proof of operation, the systems, overall and singularly, shall be tested at various times according to the test specifications. All field tests shall be performed by the WIM Vendor and observed by the Department with all reports submitted to the Department.

(4) Factory Acceptance Tests.

(a) Prior to shipment of any equipment, Factory Acceptance Tests shall be performed for each system to verify the equipment operating as described in the contract documents and in accordance with the test specifications approved by the Department. The Factory Acceptance Tests shall include at minimum the following:

i. A physical inspection to verify that the quality of material and workmanship satisfy specified requirements and standards and that the equipment and software under test are complete and ready for delivery.

ii. A functional test to verify that the equipment and software operate as described in the contract documents.

iii. A performance test to verify that the equipment satisfies performance and operation criteria

(b) For the purpose of these tests the equipment and software shall be configured as nearly as possible to the final configuration. Any field inputs not available at the factory test site shall be simulated to provide a close approximation to actual site conditions.

(5) Site Acceptance Test. After all the equipment and software have been installed at the site, the Vendor shall run tests to ensure that all equipment shall operate as specified in the contract documents. These tests shall be witnessed or conducted by the Department within one (1) week of the manufacturer notifying the Department that the system is ready for testing.

(6) Continuous Operating Test.

1326
1327 (a) Following successful completion of the Site Acceptance
1328 Test, a Continuous Operating Test shall be conducted for a
1329 period of thirty (30) calendar days. During this period the system
1330 shall operate under normal conditions and attain a Level of
1331 Service of 98.0% or better of the total station operating hours
1332 within any period of thirty (30) consecutive days.

1333
1334 (b) The Weight Sorter System shall be considered
1335 unavailable when:

1336
1337 i. A major system component completely fails which
1338 significantly degrades the performance or operation of
1339 the weigh station. This situation is said to have prevailed
1340 if either the WIM system or the communication system
1341 has failed.

1342
1343 ii. More than one (1) system component fails to
1344 operate or respond to operator commands and/or system
1345 automation for more than thirty (30) minutes.

1346
1347 iii. Weekly WIM accuracy is not met.

1348
1349 (c) During the continuous operating test, the entire system
1350 shall be fully operational under normal traffic conditions and
1351 operate trouble free for thirty (30) consecutive days.

1352
1353 (d) In the event that one (1) of the abovementioned
1354 conditions persists and the specified availability cannot be
1355 achieved, the WIM Vendor will be informed and problem(s) shall
1356 be corrected and the continuous operating test shall start over
1357 until thirty (30) continuous days of trouble free operation are
1358 experienced.

1359
1360 (e) The continuous operating test will be the basis for
1361 acceptance or rejection of the systems as a result of
1362 demonstrated performance.

1363
1364 (f) The Department shall issue a Certificate of Final
1365 Acceptance upon successful completion of the Continuous
1366 Operating Test and training program.

1367
1368 (g) This calibration/acceptance procedure follows ASTM E
1369 1318 Standards. Calibration is to be performed by the running
1370 of one (1) calibration truck. The test vehicle should be a five (5)
1371 axle, tractor/trailer combination (3S2), with air ride suspension.

The truck will be in excellent mechanical condition. The truck will be loaded with solid, non-shifting material. The truck will be loaded to with ninety percent (90%) to one hundred percent (100%) of allowable Gross Vehicle Weight for the road under test.

(h) The calibration procedure is as follows:

i. The vehicle will be weighed at a government certified static weigh scale. The weight information on the front (single axle), drive (tandem axle group), and trailer (tandem axle group), should be recorded. The Gross Vehicle Weight (GVW) of the vehicle will be calculated by adding the three (3) weights together.

ii. The distance between the five (5) individual axles on the truck will be measured and recorded.

iii. The test vehicle will make three (3) test passes over the system under test at a selected speed which is indicative of the truck traffic at the site. Adjustments will be made by vendor personnel on site during this time to fine tune the axle spacing, and weight output of the WIM system.

iv. Once all initial adjustments have been made, the test vehicle will make an additional two (2) test passes to confirm the accuracy of the adjustments. If all the readings fall within the ASTM ranges for the WIM Type under test, and vendor personnel do not feel that additional adjustments are required, the tests will continue. If this is not the case, additional adjustments will be performed and two (2) more confirming passes will be made by the test truck.

v. The test truck should then make an additional ten (10) passes at a selected speed that is indicative of the truck traffic at the test site.

vi. All of the data should be recorded and placed into a spreadsheet. The mean error and standard deviation for all recorded measurements will be calculated at the end of the ten (10) test passes. The calculations will be as follows:

(i) For weight measurements, the percent error for each test pass will be calculated using the following formula: $[(WIM\ Weight - Static\ Weight)/Static\ Weight] \times 100 = \% \text{ error}$

(ii) The mean error for each weight type (single, group, GVW) will be calculated as follows: $\% \text{ errors for single, group or GVW} / \# \text{ of samples} = \text{Mean error}$. (Each weight type calculated individually)

(iii) The error for individual axle spacings will be calculated using the following formula: $10 \text{ of } [(WIM\ Axle\ Spacings - Actual\ Axle\ Spacing)] / 10 = \text{Mean Axle Spacing Error}$. (Each of the four (4) axle spacings calculated individually)

(iv) All of the calculated errors will also be entered into the spreadsheet.

vii. A check will be made of the calculated result against the acceptable range for the ASTM WIM Type under test. There will be one (1) of two (2) results:

(i) If ninety-five percent (95%) of all recorded test results, (single axles, axle groups, GVW, axle spacing) fall within the specified tolerance for the ASTM WIM Type under test then the system will have passed the requirements.

(ii) If less than ninety-five percent (95%) of the calculated differences fall within the specified tolerance for the ASTM WIM Type under test then the system will be readjusted and an additional ten (10) test passes will be required to retest the system.

(iii) The testing will continue until the system passes all criteria according to ASTM E 1318 Standards.

(M) Training.

(1) The Vendor shall set up and conduct formal training programs for Department personnel on the operation of the WIM systems. The training shall include the following:

1463
1464 (a) Two (2) half-day operator training sessions providing an
1465 introduction to the operation of the WIM Systems and to the
1466 functions performed by the major system components. A class
1467 size of up to eight (8) individuals per session can be expected.
1468

1469 (b) Two (2) one-day "hands-on" guidance sessions for
1470 operators in the operation of the systems. A class size of up to
1471 four (4) individuals per session can be expected. This training
1472 will occur during the first two (2) days of the Continuous
1473 Operating Test.
1474

1475 (2) The training program will be scheduled the week following the
1476 completion of the operations test.
1477

1478 (3) The cost for the first training sessions shall be included in the
1479 contract price. The Department shall, from time to time review any
1480 future training requirements. The WIM Vendor shall agree to provide
1481 future and additional training sessions upon receipt of requests from the
1482 Department. The Department shall reimburse the WIM Vendor the cost
1483 of providing additional training sessions on a per diem basis and at a
1484 rate agreed upon by Department at the time of the request. The
1485 Department shall provide classroom space for training session.
1486

1487 (N) **Warranty.**
1488

1489 (1) The WIM Vendor shall warrant all manufactured materials and
1490 equipment for a period of three (3) year from the date of acceptance of
1491 the system.
1492

1493 (2) The warranty shall cover the manufacture of the equipment, and
1494 includes manufacturer's workmanship, material defects, assembly and
1495 installation of system components, hardware and software. The
1496 warranty shall not cover damage to any in-road equipment as a result
1497 of pavement deterioration. The warranty shall not cover physical
1498 damage caused by accident, vandalism, lightning, flood, fire, acts of
1499 God, acts of war or terrorism, or improper installation or servicing by
1500 personnel not authorized by the Vendor.
1501

1502 (3) The Vendor shall not under any circumstances be liable for any
1503 special, incidental, indirect or consequential damage, including
1504 damages from the use or malfunction of the product, loss of profits or
1505 revenue or cost of replacement goods, whether the Vendor has been
1506 informed or not in advance of the possibility of such damages.
1507

(4) Following the expiry of the warranty, the Vendor shall provide the option of a system maintenance service contract for a period to be negotiated between the Department and the Vendor.

(O) Scheduled Maintenance Service.

(1) The Vendor's routine maintenance on all major systems, system components and ancillary equipment shall be schedule at six (6) month intervals. A semi-annual maintenance report shall be submitted to the Department upon completion of the scheduled maintenance service. Scheduled maintenance, emergency maintenance and refresher training shall be included as part of the three (3) year warranty.

(2) The scheduled maintenance service shall include the following:

(a) Visual inspection, signal checks, and testing measures on all loops.

(b) Cleaning, repair, and testing measures on all WIM Scales.

(c) Visual inspection, testing measures, and signal checks on all road sensors.

(d) Visual inspection and cleaning of cabinet and system electronics.

(e) Maintenance of WIM cables, connectors, terminal strips, and back-up batteries.

(f) Electrical inspection.

(g) Cabinet mechanical condition inspection.

(h) Heating, ventilation, and air conditioning maintenance (if applicable).

(i) Interface card operation inspection, testing measures, and maintenance.

(j) Notification Lane Control Signal inspection, testing, and maintenance.

(k) Structural integrity check of all poles, and mast arms.

1553 (l) Inspection and verification of computer communication
1554 systems.

1555
1556 (m) Camera and Video inspection, testing, and maintenance.

1557
1558 (n) A report shall accompany the scheduled maintenance
1559 service and shall be submitted to the Department. The report
1560 shall include:

1561
1562 (o) Pass/Fail grading of all sensors.

1563
1564 (p) A checklist of all components checked as listed above,
1565 as well as the location of the components and comments on their
1566 general state.

1567
1568 (q) A checklist and commentary detailing whether each
1569 component (as listed above) met standards or required repairs.

1570
1571 (3) **Emergency Repair Services.** Emergency repair services shall
1572 be completed on an as-required basis. The maximum response time
1573 will be two (2) business days for notice by email or other mutually
1574 agreed upon mode of communication. The Vendor shall initiate on-site
1575 repairs within seven (7) days of notification.

1576
1577 (4) **Operator Refresher Courses.** In conjunction with the
1578 scheduled maintenance services, the Vendor shall provide Operator
1579 Refresher Courses on the operation of the entire WIM System. The
1580 courses shall have a maximum duration of four (4) hours and shall be
1581 scheduled before or after the semi-annual maintenance service. The
1582 course attendees shall be decided by the Department.

1583
1584 (5) **Network communications at the Roadside Cabinet.** including
1585 three (3) year data service plan to accommodate Weigh-in-Motion
1586 system operations will be included as part of this project. (300
1587 monthly gigabyte allowance and 25Mbps service or equivalent for
1588 proper operation of the Weigh-in-Motion System).

1589
1590 Note this network communications service plan is for the Roadside
1591 WIM Electronics Cabinet only. The communication link that HDOT
1592 will use to remotely connect to the WIM system from the Weigh
1593 Station location or other HDOT locations is not included within this
1594 project, and is the responsibility of others.

1595
1596 (P) **Material.** Material used in the construction of this equipment shall be
1597 of good commercial quality entirely suitable for the intended purpose. Material

shall be free from all defects and imperfections that might affect serviceability of the finished product.

(Q) Standard Products. The equipment shall be constructed of standard material, so that the prompt and continuing service and delivery of spare parts may be assured. The component parts need not be products of the same manufacturer.

(R) Lightning Protection.

(1) Ground rod(s) shall be provided and installed at all outdoor equipment cabinet locations, scale vault(s), and equipment mounting pole(s) and structure(s). All system components and equipment shall be properly grounded.

(2) Lightning protection devices shall be provided for signal input/output and power connections at any separately packaged electronic signal processing device/equipment.

(3) Lightning protection devices shall be either in the form of terminal boxes equipped with terminal blocks and lightning/transient suppressors or modular lightning protectors. Lightning protection shall be provided.

679.04 Measurement. The Weigh-In-Motion System and 3-year Wireless Data Plan will be paid on a lump sum basis. Measurement for payment will not apply.

679.05 Basis of Payment. The Engineer will pay for the accepted Weigh-In-Motion System and 3-year Wireless Data Plan on a contract lump sum basis. Payment will be for full compensation for the work prescribed in this section and the contract documents.

The Engineer will consider additional materials and labor, needed to complete the installation of the system and not shown in the contract included in the bid price of the various contract items.

The Engineer will pay for hauling and stockpiling of salvaged materials and equipment off the right-of-way as ordered by the Engineer in accordance with Subsection 104.02 – Changes.

The Engineer will pay for each of the pay items when included in the proposal schedule:

Pay Item	Pay Unit
Weigh-In-Motion System	L.S.

1644

1645 3-Year Wireless Data Plan

L.S.

1646

1647

1648

1649

END OF SECTION 679

1 Make this Section a part of the Standard Specifications:

2
3 **"SECTION 695 - PORTABLE CONCRETE BARRIER**

4
5
6 **695.01 Description.** This section is for furnishing, hauling, installing,
7 maintaining, relocating, and subsequently removing portable concrete barriers and
8 end treatment systems according to the contract documents.

9
10 **695.02 Materials.**

11
12 **(A) Portable Concrete Barriers.** Materials must meet the requirements
13 specified in the following subsections of Division 700 - Materials.

14

15 Reinforcing Steel	709.01
16	
17 Reflector Marker	750.07
18	
19 Preformed Pavement Marking Tape	755.04
20	
21 Structural Steel	713.01
22	
23 High-Strength Bolts and Studs	718.02
24	
25 Nuts	718.03
26	

27
28 **695.03 Construction Requirements.**

29
30 **(A) Portable Concrete Barriers.**

31
32 **(1) Fabrication.** Construct the contractor furnished portable
33 concrete barriers in accordance with contract plans and as modified
34 herein. The barriers must be in 240-inch segments. The
35 identification and date of design must be placed at the location
36 shown in the plans. Prior to fabrication of the portable concrete
37 barrier, submit detailed shop drawings to the Engineer for review and
38 acceptance.

39
40 **(a) Forms.** Forms must be according to Section 503 -
41 Concrete Structures.
42

43 (b) **Concrete.** Use 5000 psi concrete.
44

45 (c) **Placing Concrete.** Moisten the form thoroughly and
46 apply form oil to all surfaces of the form that will come in
47 contact with concrete immediately prior to the placing of the
48 concrete. Forms must be in a state that they must not absorb
49 or add moisture to the concrete and be water-tight. Place the
50 concrete in accordance with Section 503 - Concrete
51 Structures. Notify the Engineer of all concrete pours so that
52 the Engineer will have an opportunity to inspect the work for
53 compliance with the Contract Documents.
54

55 (d) **Curing.** Cure the portable concrete barriers in
56 accordance with Subsection 504.03(G) - Curing.
57

58 (e) **Handling.** Do not handle or move the portable
59 concrete barriers until the concrete has attained a
60 compressive strength of more than 3,000 pounds per square
61 inch. Only lifting holes must be used to hoist the portable
62 concrete barrier. Do not use the drainage slots that are
63 located at the bottom of the barrier to lift or move the barriers.
64 The Engineer may direct barriers to be repaired or replaced
65 when damaged by handling at no increase in the contract
66 price and contract time.
67

68 The stacking of precast barriers may be employed by
69 the Contractor only when prior acceptance of the method is
70 obtained from the Engineer.”
71

72 (f) **Accessories.** Furnish, install, and maintain a
73 longitudinal 4-inch by 240-inch permanent preformed
74 pavement marking tape, Type I (color to match appropriate
75 roadway pavement stripe) on the lower side of the barrier
76 facing traffic, furnish, and install one RM-2 reflector marker,
77 and a steady burn amber lamp on each barrier unit. Space
78 the reflector markers, and lamps so that when multiple
79 barriers are used, they will alternate and be approximately
80 evenly spaced from lamp to lamp or reflector marker to
81 reflector marker. The longitudinal 4-inch permanent
82 preformed pavement marking tape must be installed on a
83 cleaned surface free of deleterious substances that would
84 affect the bonding of the primer or tape. Apply the tape’s
85 manufacturer’s recommended primer to the entire concrete
86 surface that will come in contact with the tape in a manner
87 acceptable to the manufacturer and the Engineer.
88

89 **(g) Ownership.** Upon completion of the project, the
90 portable concrete barriers and the portable concrete barrier
91 end treatments must become the property of the Department
92 of Transportation, Highways Division, Oahu District.
93
94

95 **(2) Installation.** Erect all barriers as shown on the contract
96 documents or as specified by the Engineer. Set the barriers in a
97 vertical position, closely following the roadway grade. The barriers
98 must have a maximum of 1/4-inch offset in any direction between
99 adjacent panels at the connections.
100

101 Install an edge line using a six-inch-wide permanent
102 preformed pavement marking tape, Type I (color to match adjacent
103 roadway pavement stripe). The permanent preformed pavement
104 marking tape must be 12 inches from the toe of the barrier,
105 however, if the situation warrants it the Engineer may allow the
106 pavement marking tape to be as close to the barrier as just in front
107 of the toe of the barrier.
108

109 Horizontal alignment of the panels must be such that any
110 panel is not out of alignment by more than 1/2-inch from a straight
111 line. Furnish and install steel pins for connecting the barrier sections
112 according to contract documents.
113

114 Barrier ends within the clear zone must not be exposed to
115 traffic and must have an end treatment that complies with MASH Test
116 Level 3 criteria.
117

118 Portable concrete barriers constructed using different designs
119 or were not built in accordance with the January 2021 design must
120 not be used together, e.g., only January 2021 design barriers will be
121 allowed to be used together within the same barrier installation.
122

123 Relocate any barrier regardless of when it was made e.g., this
124 project, another project, or its location during the duration of the
125 project. Relocate the barriers to the locations shown in the contract
126 documents or as ordered by the Engineer.
127

128 Upon completion of the work, clean, repair, remove, haul,
129 offload and store all units at the location shown in the contract
130 documents or as ordered by the Engineer. If the final designation is
131 not available when the units are ready to be removed, haul the units
132 to an interim location or an alternate Engineer designated location at
133 no additional cost to the State.
134

The cleaning and repair of the barriers must be performed regardless of cause, e.g., accidents, 'wear and tear', improper handling by the Contractor during use. Cleaning and maintaining of the barriers must be at a level that the barriers are easy to see by the traveling public. Maintenance must be to a level that the barrier functions as designed and has not decreased the safety of the traveling public as solely determined by the Engineer. Repair all damaged barriers back to their original configuration, i.e., undamaged condition. A damaged barrier that, in the sole judgment of the Engineer, is considered irreparable for any reason, must be replaced with a new barrier and the irreparable barrier disposed of. This must be done at no increase in the contract price or contract time. However, if the irreparable barrier is of a pre- January 2021 design the contractor must replace the barrier with two January 2021 design barriers. The Engineer will inspect the barriers at the storage area designated in the contract documents or at a location designated by the Engineer. Any barrier that is not cleaned or repaired to an acceptable condition must be removed from the designated storage site and not returned until is made acceptable or new replacement barriers are supplied.

Portable concrete barriers must only be used for work zone traffic control, e.g., traffic barriers. Portable concrete barriers must not be used as retaining walls, grade adjustment walls, material enclosure walls, etc. If the portable concrete barriers are used for other than which it was designed or built for, or both the barriers used in such a manner will be deemed irreparable and must be replaced with new portable concrete barriers at no additional cost or the Engineer may deduct the contract price of new barriers from the monthly estimate.

(B) Pavement Striping and Markers for Lane Shifting.

Furnish and install pavement striping and markings according to Section 629 - Pavement Markings, Subsection 629.03(C) – Permanent Pavement Markings. Do not use temporary pavement striping and markers. Striping must be done in accordance with the contract documents or as directed by the Engineer. If no striping plan is provided, submit a striping plan for review and acceptance by the Engineer a minimum of 14 days prior to the installation of barriers and end treatments. Upon completion of the contract work, remove the lane shift striping and markers, and restore the original striping and markers in accordance with the contract documents or as directed by the Engineer.

695.04 Method of Measurement. The Engineer will measure portable concrete barriers per each.

The Engineer will not measure the installing, maintaining, cleaning, repairing, and subsequently removing the lane shift pavement striping and markers for payment.

695.05 Basis of Payment. The Engineer will pay for the accepted portable concrete barriers at a contract price per pay unit, as shown in the proposed schedule. The price includes full compensation for work prescribed in this section and the contract documents.

The Engineer will not pay separately for the accepted portable concrete barriers' installation, maintenance, and delivery. The Engineer will consider the cost for the accepted portable concrete barriers' installation, maintenance, and delivery as included in the contract price of the contractor furnished portable concrete barriers. The price includes full compensation for preparing beds; hauling and setting portable concrete barriers; installing connector pins; maintaining reflector markers, lamps, permanent preformed pavement marking tape; cleaning, maintaining, to complete the work.

The Engineer will pay for each of the following pay items when included in the proposal schedule:

Pay Item	Pay Unit
Portable Concrete Barrier, 20-Ft	Each

The Engineer will make partial payments as follows:

(1) Pay 40% of the amount bid when the portable concrete barrier is furnished and delivered to the project site and the ground is prepared for installation.

(2) Pay 30% of the amount bid when the portable concrete barrier is assembled and installed at the initial location shown in the contract documents.

(3) Divide 30% of the amount bid unit by the total number of months remaining in the contract time after the initial installation is complete. Pay that percentage each month, when portable concrete barriers are satisfactorily relocated or maintained or damaged barriers are replaced or a combination thereof during construction.

END OF SECTION 695

1 **SECTION 699 – MOBILIZATION**
2

3 Make the following amendments to said Section:
4

5 **(I)** Amend **699.03 Applicability** by revising from lines 21 to 24 to read as
6 follows:
7

8 **“699.03 Applicability.** Maximum bid allowed for this item is an amount not to
9 exceed 6 percent of the sum of all items excluding the bid price of this item.”
10

11 **(II)** Amend **699.05 Payment** by revising from lines 44 to 47 to read as follows:
12

13 “Mobilization (Not to exceed 6 percent of the sum of all items
14 excluding the bid price of this item) Lump Sum”
15
16
17
18
19
20

END OF SECTION 699

1 **SECTION 702 – BITUMINOUS MATERIALS**
2

3 Make the following amendments to said Section:
4

5 **(I)** Amend **Subsection 702.01** by replacing lines 4 and 5 to read:
6

7 **“702.01 Asphalt Cement.**
8

9 **(A) PG 64-16.** Performance graded (PG) asphalt binder (neat or
10 unmodified) shall conform to AASHTO M 320.
11

12 **(B) PG 64E-22.** Performance graded binder (polymer modified) shall
13 conform to AASHTO M 332 and meet the following additional requirement:
14

15 AASHTO T 315 Determining the Rheological Properties of Asphalt
16 Binder Using a Dynamic Shear Rheometer (DSR). Phase angle on
17 original binder shall be less than 77 degrees.
18

19 **(C) Submittals.** Submit, before usage, a Certificate of Compliance,
20 accompanied by substantiating test data, showing conformance with
21 Performance Graded Asphalt Binder Specification. The Engineer will not
22 accept the PG binder without adequate documentation.”
23

24 **(II)** Amend **Subsection 702.06 (Unassigned)** by replacing line 23 to read:
25

26 **“702.06 Warm Mix Asphalt (WMA) Additive.** Additives for WMA shall be
27 approved by the Engineer.”
28
29
30
31
32
33

34 **END OF SECTION 702**
35
36

1 **SECTION 755 – PAVEMENT MARKING MATERIALS**

2
3 Make the following amendments to said Section:

4
5 **(I) Amend Subsection 755.02 (C) Retroreflective Pavement Markers** by
6 revising lines 223 to 236 to read:

7
8 “Exterior surface of shell shall be smooth and contain one or two
9 retroreflective faces of specified color.”

10
11 **(II) Amend Subsection 755.05 (C)(1) Glass Beads** by adding the following
12 after line 869:

13
14 **“(f)** The glass spheres shall not contain more than 200 ppm (total)
15 arsenic, 200 ppm (total) antimony nor more than 200 ppm (total)
16 lead, when tested according to EPA Methods 3052 and 6010C.
17 Other suitable x-ray fluorescence spectrometry analysis methods
18 may be used to screen samples of glass spheres for arsenic and
19 lead content.”

20
21
22
23
24
25
26
27 **END OF SECTION 755**

Requirements of Chapter 104, HRS

Wages and Hours of Employees on Public Works Law

Chapter 104, HRS, applies to every public works construction project over \$2,000, regardless of the method of procurement or financing (purchase order, voucher, bid, contract, lease arrangement, warranty, SPRB).

Rate of Wages for Laborers and Mechanics

- Minimum prevailing wages (basic hourly rate plus fringe benefits), as determined by the Director of Labor and Industrial Relations and published in wage rate schedules, shall be paid to the various classes of laborers and mechanics working on the job site. [§104-2(a), (b), Hawaii Revised Statutes (HRS)]
- If the Director of Labor determines that prevailing wages have increased during the performance of a public works contract, the rate of pay of laborers and mechanics shall be raised accordingly. [§104-2(a) and (b), HRS; §12-22-3(d) Hawaii Administrative Rules (HAR)]

Overtime

- Laborers and mechanics working on a Saturday, Sunday, or a legal holiday of the State or more than eight hours a day on any other day shall be paid overtime compensation at not less than one and one-half times the basic hourly rate plus the cost of fringe benefits for all hours worked. If the Director of Labor determines that a prevailing wage is defined by a collective bargaining agreement, the overtime compensation shall be at the rates set by the applicable collective bargaining agreement [§§104-1, 104-2(c), HRS; §12-22-4.1, HAR]

Weekly Pay

- Laborers and mechanics employed on the job site shall be paid their full wages at least once a week, without deduction or rebate, except for legal deductions, within five working days after the cutoff date. [§104-2(d), HRS]

Posting of Wage Rate Schedules

- Wage rate schedules with the notes for prevailing wages and special overtime rates, shall be posted by the contractor in a prominent and easily accessible place at the job site. A copy of the entire wage rate schedule shall be given to each laborer and mechanic employed under the contract, except when the employee is covered by a collective bargaining agreement. [§104-2(d), HRS]

Withholding of Accrued Payments

- If necessary, the contracting agency may withhold accrued payments to the contractor to pay to laborers and mechanics employed by the contractor or subcontractor on the job site any difference between the wages required by the public works contract or specifications and the wages received. [§104-2(e), HRS]

Certified Weekly Payrolls and Payroll Records

- A certified copy of all payrolls shall be submitted weekly to the contracting agency. [§104-3(a), HRS; §12-22-10, HAR]
- The contractor is responsible for the submission of certified copies of the payrolls of all subcontractors. The certification shall affirm that the payrolls are correct and complete, that the wage rates listed are not less than the applicable rates contained in the applicable wage rate schedule, and that the classifications for each laborer or mechanic conform with the work the laborer or mechanic performed. [§104-3(a), HRS; §12-22-10, HAR]
- Payroll records shall be maintained by the contractor and subcontractors for three years after completion of construction. The records shall contain: [§104-3(b), HRS; §12-22-10, HAR]
 - the name and home address of each employee
 - the last four digits of social security number
 - a copy of the apprentice's registration with DLIR
 - the employee's correct classification
 - rate of pay (basic hourly rate + fringe benefits)
 - itemized list of fringe benefits paid
 - daily and weekly hours worked
 - weekly straight time and overtime earnings
 - amount and type of deductions
 - total net wages paid
 - date of payment
- Records shall be made available for examination by the contracting agency, the Department of Labor and Industrial Relations (DLIR), or any of its authorized representatives, who may also interview employees during working hours on the job. [§§104-3(c), 104-22(a), HRS; §12-22-10, HAR]

Termination of Work on Failure to Pay Wages

- If the contracting agency finds that any laborer or mechanic employed on the job site by the contractor or any subcontractor has not been paid prevailing wages or overtime, the contracting agency may, by written notice to the contractor, terminate the contractor's or subcontractor's right to proceed with the work or with the part of the work in which the required wages or overtime compensation have not been paid. The contracting agency may complete this work by contract or otherwise, and the contractor or contractor's sureties shall be liable to the contracting agency for any excess costs incurred. [§104-4, HRS]

Apprentices

- Apprentice wage rates apply to contractors who are a party to a bona fide apprenticeship program which has been registered with the DLIR. In order to be paid apprentice rates, apprentices must be parties to an agreement either registered with or recognized as a USDOL nationally approved apprenticeship program by the DLIR, Workforce Development Division, (808) 586-8877, and the apprentice must be individually registered by name with the DLIR. [§12-22-6(1) and (2), HAR]
- The number of apprentices on any public work in relation to the number of journeyworkers in the same craft classification as the apprentices employed by the same employer on the same public work may not exceed the ratio allowed under the apprenticeship standards registered with or recognized by the DLIR. A registered or recognized apprentice receiving the journeyworker rate will not be considered a journeyworker for the purpose of meeting the ratio requirement. [§12-22-6(3), HAR]

Enforcement

- To ensure compliance with the law, DLIR and the contracting agency will conduct investigations of contractors and subcontractors. If a contractor or subcontractor violates the law, the penalties are: [§104-24, HRS]
 - First Violation Equal to 25% of back wages found due or \$250 per offense up to \$2,500, whichever is greater.
 - Second Violation Equal to amount of back wages found due or \$500 for each offense up to \$5,000, whichever is greater.
 - Third Violation Equal to two times the amount of back wages found due or \$1,000 for each offense up to \$10,000, whichever is greater; and
Suspension from doing any new work on any public work of a governmental contracting agency for three years.
- A violation would be deemed a second violation if it occurs within two years of the **first notification of violation**, and a third violation if it occurs within three years of **the second notification of violation**. [§104-24, HRS; §12-22-25(b), HAR]
- **Suspension:** For a first or second violation, the department shall immediately suspend a contractor who fails to pay wages or penalties until all wages and penalties are paid in full. For a third violation, the department shall penalize and suspend the contractor as described above, **except that if the contractor continues to violate the law, then the department shall immediately suspend the contractor for a mandatory three years. The contractor shall remain suspended until all wages and penalties are paid in full.** [§§104-24, 104-25, HRS]
- **Suspension:** Any contractor who fails to make payroll records accessible or provide requested information within 10 days, or fails to keep or falsifies any required record, shall be assessed a penalty including suspension as provided in Section 104-22(b) and 104-25(a)(3), HRS. [§104-3(c), HRS; §12-22-26, HAR]
- If any contractor interferes with or delays any investigation, the contracting agency shall withhold further payments until the delay has ceased. Interference or delay includes failure to provide requested records or information within ten days, failure to allow employees to be interviewed during working hours on the job, and falsification of payroll records. The department shall assess a penalty of \$10,000 per project, and \$1,000 per day thereafter, for interference or delay. [§104-22(b), HRS; §12-22-26, HAR]
- Failure by the contracting agency to include in the provisions of the contract or specifications the requirements of Chapter 104, HRS, relating to coverage and the payment of prevailing wages and overtime, is not a defense of the contractor or subcontractor for noncompliance with the requirements of this chapter. [§104-2(f), HRS]



For additional information, visit the department's website at <http://labor.hawaii.gov/wsd> or contact any of the following DLIR offices:

Oahu (Wage Standards Division)(808) 586-8777
Hawaii Island.....(808) 974-6464
Maui and Kauai(808) 243-5322

"General Decision Number: HI20250001 12/12/2025

Superseded General Decision Number: HI20240001

State: Hawaii

Construction Types: Building, Heavy (Heavy and Dredging), Highway and Residential

Counties: Hawaii Statewide.

BUILDING CONSTRUCTION PROJECTS; RESIDENTIAL CONSTRUCTION PROJECTS (consisting of single family homes and apartments up to and including 4 stories); HEAVY AND HIGHWAY CONSTRUCTION PROJECTS AND DREDGING

Modification Number	Publication Date
0	01/03/2025
1	01/24/2025
2	01/31/2025
3	02/14/2025
4	02/28/2025
5	03/14/2025
6	04/04/2025
7	04/18/2025
8	06/20/2025
9	08/01/2025
10	08/08/2025
11	09/12/2025
12	09/19/2025
13	12/12/2025

ASBE0132-001 09/07/2025

	Rates	Fringes

Asbestos Workers/Insulator		
Includes application of all insulating materials, protective coverings, coatings and finishes to all types of mechanical systems. Also the application of firestopping material for wall openings and penetrations in walls, floors, ceilings and curtain walls.....	\$ 46.90	29.75

BOIL0627-005 01/01/2025

	Rates	Fringes

BOILERMAKER.....	\$ 49.37	31.25

BRHI0001-001 09/05/2023

	Rates	Fringes

BRICKLAYER		
Bricklayers and Stonemasons.	\$ 48.03	32.23

Pointers, Caulkers and Weatherproofers.....	\$ 48.28	32.23

BRHI0001-002 09/05/2023

	Rates	Fringes

Tile, Marble & Terrazzo Worker		
Terrazzo Base Grinders.....	\$ 44.69	33.00
Terrazzo Floor Grinders and Tenders.....	\$ 43.14	33.00
Tile, Marble and Terrazzo Workers.....	\$ 46.50	33.00

CARP0745-001 09/01/2025

	Rates	Fringes

Carpenters:

Carpenters; Hardwood Floor Layers; Patent Scaffold Erectors (14 ft. and over); Piledrivers; Pneumatic Nailers; Wood Shinglers and Transit and/or Layout Man.....		
	\$ 55.50	29.81
Millwrights and Machine Erectors.....		
	\$ 55.75	29.81
Power Saw Operators (2 h.p. and over).....		
	\$ 55.65	29.81

CARP0745-002 09/01/2025

	Rates	Fringes

Drywall and Acoustical Workers and Lathers.....	\$ 55.75	29.81

ELEC1186-001 08/24/2025

	Rates	Fringes

Electricians:

Cable Splicers.....	\$ 63.90	33.38
Electricians.....	\$ 56.55	33.16
Telecommunication worker....	\$ 41.00	16.28

ELEC1186-002 08/24/2025

	Rates	Fringes

Line Construction:

Cable Splicers.....	\$ 63.90	33.38
Groundmen/Truck Drivers.....	\$ 42.41	27.14
Heavy Equipment Operators...	\$ 50.90	30.75
Linemen.....	\$ 56.55	33.16
Telecommunication worker....	\$ 41.00	16.28

ELEV0126-001 01/01/2025

	Rates	Fringes

ELEVATOR MECHANIC.....	\$ 73.85	38.435+a+b

a. VACATION: Employer contributes 8% of basic hourly rate for

5 years service and 6% of basic hourly rate for 6 months to 5 years service as vacation pay credit.

b. PAID HOLIDAYS: New Year's Day, Memorial Day, Independence Day, Labor Day, Veterans' Day, Thanksgiving Day, the Friday after Thanksgiving Day and Christmas Day.

 ENGI0003-002 09/01/2025

	Rates	Fringes
Diver (Aqua Lung) (Scuba))		
Diver (Aqua Lung) (Scuba)		
(over a depth of 30 feet)...\$ 81.72		35.68
Diver (Aqua Lung) (Scuba)		
(up to a depth of 30 feet)..\$ 72.35		35.68
Stand-by Diver (Aqua Lung)		
(Scuba).....\$ 62.97		35.68
Diver (Other than Aqua Lung)		
Diver (Other than Aqua		
Lung).....\$ 81.72		35.68
Diver Tender (Other than		
Aqua Lung).....\$ 59.94		35.68
Stand-by Diver (Other than		
Aqua Lung).....\$ 62.97		35.68
Helicopter Work		
Airborne Hoist Operator		
for Helicopter.....\$ 61.52		35.68
Co-Pilot of Helicopter.....\$ 61.66		35.68
Pilot of Helicopter.....\$ 62.83		35.68
Power equipment operator -		
tunnel work		
GROUP 1.....\$ 57.96		35.68
GROUP 2.....\$ 58.07		35.68
GROUP 3.....\$ 58.24		35.68
GROUP 4.....\$ 58.51		35.68
GROUP 5.....\$ 58.82		35.68
GROUP 6.....\$ 59.47		35.68
GROUP 7.....\$ 59.79		35.68
GROUP 8.....\$ 59.90		35.68
GROUP 9.....\$ 60.01		35.68
GROUP 9A.....\$ 60.24		35.68
GROUP 10.....\$ 60.30		35.68
GROUP 10A.....\$ 60.45		35.68
GROUP 11.....\$ 60.60		35.68
GROUP 12.....\$ 60.96		35.68
GROUP 12A.....\$ 61.32		35.68
Power equipment operators:		
GROUP 1.....\$ 57.66		35.68
GROUP 2.....\$ 57.77		35.68
GROUP 3.....\$ 57.94		35.68
GROUP 4.....\$ 58.21		35.68
GROUP 5.....\$ 58.52		35.68
GROUP 6.....\$ 59.17		35.68
GROUP 7.....\$ 59.49		35.68
GROUP 8.....\$ 59.60		35.68
GROUP 9.....\$ 59.71		35.68
GROUP 9A.....\$ 59.94		35.68
GROUP 10.....\$ 60.00		35.68
GROUP 10A.....\$ 60.15		35.68
GROUP 11.....\$ 60.30		35.68
GROUP 12.....\$ 60.66		35.68
GROUP 12A.....\$ 61.02		35.68
GROUP 13.....\$ 57.94		35.68

GROUP 13A.....	\$ 58.21	35.68
GROUP 13B.....	\$ 58.52	35.68
GROUP 13C.....	\$ 59.17	35.68
GROUP 13D.....	\$ 59.49	35.68
GROUP 13E.....	\$ 59.60	35.68

POWER EQUIPMENT OPERATORS CLASSIFICATIONS

GROUP 1: Fork Lift (up to and including 10 tons); Partsman (heavy duty repair shop parts room when needed).

GROUP 2: Conveyor Operator (Handling building material); Hydraulic Monitor; Mixer Box Operator (Concrete Plant).

GROUP 3: Brakeman; Deckhand; Fireman; Oiler; Oiler/Gradechecker; Signalman; Switchman; Highline Cableway Signalman; Bargeman; Bunkerman; Concrete Curing Machine (self-propelled, automatically applied unit on streets, highways, airports and canals); Leveeman; Roller (5 tons and under); Tugger Hoist.

GROUP 4: Boom Truck or dual purpose "A" Frame Truck (5 tons or less); Concrete Placing Boom (Building Construction); Dinky Operator; Elevator Operator; Hoist and/or Winch (one drum); Straddle Truck (Ross Carrier, Hyster and similar).

GROUP 5: Asphalt Plant Fireman; Compressors, Pumps, Generators and Welding Machines ("Bank" of 9 or more, individually or collectively); Concrete Pumps or Pumpcrete Guns; Lubrication and Service Engineer (Grease Rack); Screedman.

GROUP 6: Boom Truck or Dual Purpose "A" Frame Truck (over 5 tons); Combination Loader/Backhoe (up to and including 3/4 cu. yd.); Concrete Batch Plants (wet or dry); Concrete Cutter, Groover and/or Grinder (self-propelled unit on streets, highways, airports, and canals); Conveyor or Concrete Pump (Truck or Equipment Mounted); Drilling Machinery (not to apply to waterliners, wagon drills or jack hammers); Fork Lift (over 10 tons); Loader (up to and including 3 and 1/2 cu. yds); Lull High Lift (under 40 feet); Lubrication and Service Engineer (Mobile); Maginnis Internal Full Slab Vibrator (on airports, highways, canals and warehouses); Man or Material Hoist; Mechanical Concrete Finisher (Large Clary, Johnson Bidwell, Bridge Deck and similar); Mobile Truck Crane Driver; Portable Shotblast Concrete Cleaning Machine; Portable Boring Machine (under streets, highways, etc.); Portable Crusher; Power Jumbo Operator (setting slip forms, etc., in tunnels); Rollers (over 5 tons); Self-propelled Compactor (single engine); Self-propelled Pavement Breaker; Skidsteer Loader with attachments; Slip Form Pumps (Power driven by hydraulic, electric, air, gas, etc., lifting device for concrete forms); Small Rubber Tired Tractors; Trencher (up to and including 6 feet); Underbridge Personnel Aerial Platform (50 feet of platform or less).

GROUP 7: Crusher Plant Engineer, Dozer (D-4, Case 450, John Deere 450, and similar); Dual Drum Mixer, Extend Lift; Hoist and/or Winch (2 drums); Loader (over 3 and 1/2 cu. yds. up to and including 6 yards.); Mechanical Finisher or Spreader Machine (asphalt), (Barber Greene and similar) (Screedman required); Mine or Shaft Hoist; Mobile Concrete Mixer (over 5 tons); Pipe Bending Machine (pipelines only); Pipe Cleaning Machine (tractor propelled and supported);

Pipe Wrapping Machine (tractor propelled and supported); Roller Operator (Asphalt); Self-Propelled Elevating Grade Plane; Slusher Operator; Tractor (with boom) (D-6, or similar); Trencher (over 6 feet and less than 200 h.p.); Water Tanker (pulled by Euclids, T-Pulls, DW-10, 20 or 21, or similar); Winchman (Stern Winch on Dredge).

GROUP 8: Asphalt Plant Operator; Barge Mate (Seagoing); Cast-in-Place Pipe Laying Machine; Concrete Batch Plant (multiple units); Conveyor Operator (tunnel); Deckmate; Dozer (D-6 and similar); Finishing Machine Operator (airports and highways); Gradesetter; Kolman Loader (and similar); Mucking Machine (Crawler-type); Mucking Machine (Conveyor-type); No-Joint Pipe Laying Machine; Portable Crushing and Screening Plant; Power Blade Operator (under 12); Saurman Type Dragline (up to and including 5 yds.); Stationary Pipe Wrapping, Cleaning and Bending Machine; Surface Heater and Planer Operator, Tractor (D-6 and similar); Tri-Batch Paver; Tunnel Badger; Tunnel Mole and/or Boring Machine Operator Underbridge Personnel Aerial Platform (over 50 feet of platform).

GROUP 9: Combination Mixer and Compressor (gunite); Do-Mor Loader and Adams Elegrader; Dozer (D-7 or equal); Wheel and/or Ladder Trencher (over 6 feet and 200 to 749 h.p.).

GROUP 9A: Dozer (D-8 and similar); Gradesetter (when required by the Contractor to work from drawings, plans or specifications without the direct supervision of a foreman or superintendent); Push Cat; Scrapers (up to and including 20 cu. yds); Self-propelled Compactor with Dozer; Self-Propelled, Rubber-Tired Earthmoving Equipment (up to and including 20 cu. yds) (621 Band and similar); Sheep's Foot; Tractor (D-8 and similar); Tractors with boom (larger than D-6, and similar).

GROUP 10: Chicago Boom; Cold Planers; Heavy Duty Repairman or Welder; Hoist and/or Winch (3 drums); Hydraulic Skooper (Koehring and similar); Loader (over 6 cu. yds. up to and including 12 cu. yds.); Saurman type Dragline (over 5 cu. yds.); Self-propelled, rubber-tired Earthmoving Equipment (over 20 cu. yds. up to and including 31 cu. yds.) (637D and similar); Soil Stabilizer (P & H or equal); Sub-Grader (Gurries or other automatic type); Tractors (D-9 or equivalent, all attachments); Tractor (Tandem Scraper); Watch Engineer.

GROUP 10A: Boat Operator; Cable-operated Crawler Crane (up to and including 25 tons); Cable-operated Power Shovel, Clamshell, Dragline and Backhoe (up to and including 1 cu. yd.); Dozer D9-L; Dozer (D-10, HD41 and similar) (all attachments); Gradall (up to and including 1 cu. yd.); Hydraulic Backhoe (over 3/4 cu. yds. up to and including 2 cu. yds.); Mobile Truck Crane Operator (up to and including 25 tons) (Mobile Truck Crane Driver Required); Self-propelled Boom Type Lifting Device (Center Mount) (up to and including 25 tons) (Grove, Drott, P&H, Pettibone and similar); Trencher (over 6 feet and 750 h.p. or more); Watch Engineer (steam or electric).

GROUP 11: Automatic Slip Form Paver (concrete or asphalt); Band Wagon (in conjunction with Wheel Excavator); Cable-operated Crawler Cranes (over 25 tons but less than 50 tons); Cable-operated Power Shovel, Clamshell, Dragline and Backhoe (over 1 cu. yd. up to 7 cu. yds.); Gradall

(over 1 cu. yds. up to 7 cu. yds.); DW-10, 20, etc. (Tandem); Earthmoving Machines (multiple propulsion power units and 2 or more Scrapers) (up to and including 35 cu. yds., "" struck"" m.r.c.); Highline Cableway; Hydraulic Backhoe (over 2 cu. yds. up to and including 4 cu. yds.); Leverman; Lift Slab Machine; Loader (over 12 cu. yds); Master Boat Operator; Mobile Truck Crane Operator (over 25 tons but less than 50 tons); (Mobile Truck Crane Driver required); Pre-stress Wire Wrapping Machine; Self-propelled Boom-type Lifting Device (Center Mount) (over 25 tons m.r.c); Self-propelled Compactor (with multiple-propulsion power units); Single Engine Rubber Tired Earthmoving Machine (with Tandem Scraper); Tandem Cats; Trencher (pulling attached shield).

GROUP 12: Clamshell or Dipper Operator; Derricks; Drill Rigs; Multi-Propulsion Earthmoving Machines (2 or more Scrapers) (over 35 cu. yds ""struck""m.r.c.); Operators (Derricks, Piledrivers and Cranes); Power Shovels and Draglines (7 cu. yds. m.r.c. and over); Self-propelled rubber-tired Earthmoving equipment (over 31 cu. yds.) (657B and similar); Wheel Excavator (up to and including 750 cu. yds. per hour); Wheel Excavator (over 750 cu. yds. per hour).

GROUP 12A: Dozer (D-11 or similar or larger); Hydraulic Excavators (over 4 cu. yds.); Lifting cranes (50 tons and over); Pioneering Dozer/Backhoe (initial clearing and excavation for the purpose of providing access for other equipment where the terrain worked involves 1-to-1 slopes that are 50 feet in height or depth, the scope of this work does not include normal clearing and grubbing on usual hilly terrain nor the excavation work once the access is provided); Power Blade Operator (Cat 12 or equivalent or over); Straddle Lifts (over 50 tons); Tower Crane, Mobile; Traveling Truss Cranes; Universal, Liebherr, Linden, and similar types of Tower Cranes (in the erection, dismantling, and moving of equipment there shall be an additional Operating Engineer or Heavy Duty Repairman); Yo-Yo Cat or Dozer.

GROUP 13: Truck Driver (Utility, Flatbed, etc.)

GROUP 13A: Dump Truck, 8 cu.yds. and under (water level); Water Truck (up to and including 2,000 gallons).

GROUP 13B: Water Truck (over 2,000 gallons); Tandem Dump Truck, over 8 cu. yds. (water level).

GROUP 13C: Truck Driver (Semi-trailer. Rock Cans, Semi-Dump or Roll-Offs).

GROUP 13D: Truck Driver (Slip-In or Pup).

GROUP 13E: End Dumps, Unlicensed (Euclid, Mack, Caterpillar or similar); Tractor Trailer (Hauling Equipment); Tandem Trucks hooked up to Trailer (Hauling Equipment)

BOOMS AND/OR LEADS (HOURLY PREMIUMS):

The Operator of a crane (under 50 tons) with a boom of 80 feet or more (including jib), or of a crane (under 50 tons) with leads of 100 feet or more, shall receive a per hour premium for each hour worked on said crane (under 50 tons) in accordance with the following schedule:

Booms of 80 feet up to but not including 130 feet or Leads of 100 feet up to but not including 130 feet	0.50
Booms and/or Leads of 130 feet up to but not including 180 feet	0.75
Booms and/or Leads of 180 feet up to and including 250 feet	1.15
Booms and/or Leads over 250 feet	1.50

The Operator of a crane (50 tons and over) with a boom of 180 feet or more (including jib) shall receive a per hour premium for each hour worked on said crane (50 tons and over) in accordance with the following schedule:

Booms of 180 feet up to and including 250 feet	1.25
Booms over 250 feet	1.75

ENGI0003-004 09/01/2025

	Rates	Fringes
Dredging: (Boat Operators)		
Boat Deckhand.....	\$ 57.94	35.68
Boat Operator.....	\$ 60.15	35.68
Master Boat Operator.....	\$ 60.30	35.68
Dredging: (Clamshell or Dipper Dredging)		
GROUP 1.....	\$ 60.66	35.68
GROUP 2.....	\$ 60.00	35.68
GROUP 3.....	\$ 59.60	35.68
GROUP 4.....	\$ 57.94	35.68
Dredging: (Derricks)		
GROUP 1.....	\$ 60.66	35.68
GROUP 2.....	\$ 60.00	35.68
GROUP 3.....	\$ 59.60	35.68
GROUP 4.....	\$ 57.94	35.68
Dredging: (Hydraulic Suction Dredges)		
GROUP 1.....	\$ 60.30	35.68
GROUP 2.....	\$ 60.15	35.68
GROUP 3.....	\$ 60.00	35.68
GROUP 4.....	\$ 59.94	35.68
GROUP 5.....	\$ 37.88	26.76
Group 5.....	\$ 59.60	35.68
GROUP 6.....	\$ 37.77	26.76
Group 6.....	\$ 59.49	35.68
GROUP 7.....	\$ 36.22	26.76
Group 7.....	\$ 57.94	35.68

CLAMSHELL OR DIPPER DREDGING CLASSIFICATIONS

GROUP 1: Clamshell or Dipper Operator.
 GROUP 2: Mechanic or Welder; Watch Engineer.
 GROUP 3: Barge Mate; Deckmate.
 GROUP 4: Bargeman; Deckhand; Fireman; Oiler.

HYDRAULIC SUCTION DREDGING CLASSIFICATIONS

GROUP 1: Leverman.
 GROUP 2: Watch Engineer (steam or electric).
 GROUP 3: Mechanic or Welder.

GROUP 4: Dozer Operator.

GROUP 5: Deckmate.

GROUP 6: Winchman (Stern Winch on Dredge)

GROUP 7: Deckhand (can operate anchor scow under direction of Deckmate); Fireman; Leveeman; Oiler.

DERRICK CLASSIFICATIONS

GROUP 1: Operators (Derricks, Piledrivers and Cranes).

GROUP 2: Saurman Type Dragline (over 5 cubic yards).

GROUP 3: Deckmate; Saurman Type Dragline (up to and including 5 yards).

GROUP 4: Deckhand, Fireman, Oiler.

 ENGI0003-044 09/01/2025

	Rates	Fringes

Power Equipment Operators (PAVING)

Asphalt Concrete Material Transfer.....	\$ 58.67	34.86
Asphalt Plant Operator.....	\$ 59.07	34.86
Asphalt Raker.....	\$ 57.68	34.86
Asphalt Spreader Operator...	\$ 59.16	34.86
Cold Planer.....	\$ 59.47	34.86
Combination Loader/Backhoe (over 3/4 cu.yd.).....	\$ 57.68	34.86
Combination Loader/Backhoe (up to 3/4 cu.yd.).....	\$ 56.70	34.86
Concrete Saws and/or Grinder (self-propelled unit on streets, highways, airports and canals).....	\$ 58.64	34.86
Grader.....	\$ 59.47	34.86
Laborer, Hand Roller.....	\$ 57.18	34.86
Loader (2 1/2 cu. yds. and under).....	\$ 58.64	34.86
Loader (over 2 1/2 cu. yds. to and including 5 cu. yds.).....	\$ 58.96	34.86
Roller Operator (five tons and under).....	\$ 57.41	34.86
Roller Operator (over five tons).....	\$ 58.84	34.86
Screed Person.....	\$ 58.64	34.86
Soil Stabilizer.....	\$ 59.47	34.86

 IRON0625-001 09/01/2024

	Rates	Fringes

Ironworkers:.....	\$ 48.00	41.86
a. Employees will be paid \$.50 per hour more while working in tunnels and coffer dams; \$1.00 per hour more when required to work under or are covered with water (submerged) and when they are required to work on the summit of Mauna Kea, Mauna Loa or Haleakala.		

 LAB00368-001 09/02/2024

	Rates	Fringes

Laborers:

Driller.....	\$ 44.75	25.96
Final Clean Up.....	\$ 31.40	21.37
Gunite/Shotcrete Operator and High Scaler.....	\$ 42.25	25.96
Laborer I.....	\$ 41.75	25.96
Laborer II.....	\$ 39.15	25.96
Mason Tender/Hod Carrier....	\$ 42.25	25.96
Powderman.....	\$ 42.75	25.96
Window Washer (bosun chair).\$	41.25	25.96

LABORERS CLASSIFICATIONS

Laborer I: Air Blasting run by electric or pneumatic compressor; Asphalt Laborer, Ironer, Raker, Luteman, and Handroller, and all types of Asphalt Spreader Boxes; Asphalt Shoveler; Assembly and Installation of Multiplates, Liner Plates, Rings, Mesh, Mats; Batching Plant (portable and temporary); Boring Machine Operator (under streets and sidewalks); Buggymobile; Burning and Welding; Chainsaw, Faller, Logloader, and Bucker; Compactors (Jackson Jumping Jack and similar); Concrete Bucket Dumpman; Concrete Chipping; Concrete Chuteman/Hoseman (pouring concrete) (the handling of the chute from ready-mix trucks for such jobs as walls, slabs, decks, floors, foundations, footings, curbs, gutters, and sidewalks); Concrete Core Cutter (Walls, Floors, and Ceiling); Concrete Grinding or Sanding; Concrete: Hooking on, signaling, dumping of concrete for treme work over water on caissons, pilings, abutments, etc.; Concrete: Mixing, handling, conveying, pouring, vibrating, otherwise placing of concrete or aggregates or by any other process; Concrete: Operation of motorized wheelbarrows or buggies or machines of similar character, whether run by gas, diesel, or electric power; Concrete Placement Machine Operator: operation of Somero Hammerhead, Copperheads, or similar machines; Concrete Pump Machine (laying, coupling, uncoupling of all connections and cleaning of equipment); Concrete and/or Asphalt Saw (Walking or Handtype) (cutting walls or flatwork) (scoring old or new concrete and/or asphalt) (cutting for expansion joints) (streets and ways for laying of pipe, cable or conduit for all purposes); Concrete Shovelers/Laborers (Wet or Dry); Concrete Screeding for Rough Strike-Off: Rodding or striking-off, by hand or mechanical means prior to finishing; Concrete Vibrator Operator; Coring Holes: Walls, footings, piers or other obstructions for passage of pipes or conduits for any purpose and the pouring of concrete to secure the hole; Cribbers, Shorer, Lagging, Sheeting, and Trench Jacking and Bracing, Hand-Guided Lagging Hammer Whaling Bracing; Curbing (Concrete and Asphalt); Curing of Concrete (impervious membrane and form oiler) mortar and other materials by any mode or method; Cut Granite Curb Setter (setting, leveling and grouting of all precast concrete or stone curbs); Cutting and Burning Torch (demolition); Dri Pak-It Machine; Environmental Abatement: removal of asbestos, lead, and bio hazardous materials (EPA and/or OSHA certified); Falling, bucking, yarding, loading or burning of all trees or timber on construction site; Forklift (9 ft. and under); Gas, Pneumatic, and Electric tools; Grating and Grill work for drains or other purposes; Green Cutter of concrete or aggregate in any form, by hand, mechanical means, grindstone or air and/or water; Grout: Spreading for any purpose; Guinea Chaser (Grade Checker) for general utility trenches, sitework, and excavation; Headerboard Man (Asphalt or Concrete); Heat Welder of Plastic (Laborers' AGC certified workers) (when work

involves waterproofing for waterpools, artificial lakes and reservoir) heat welding for sewer pipes and fusion of HDPE pipes; Heavy Highway Laborer (Rigging, signaling, handling, and installation of pre-cast catch basins, manholes, curbs and gutters); High Pressure Nozzleman - Hydraulic Monitor (over 100# pressure); Jackhammer Operator; Jacking of slip forms: All semi and unskilled work connected therewithin; Laying of all multi-cell conduit or multi-purpose pipe; Magnesite and Mastic Workers (Wet or Dry)(including mixer operator);Mortar Man; Mortar Mixer (Block, Brick, Masonry, and Plastering); Nozzleman (Sandblasting and/or Water Blasting): handling, placing and operation of nozzle; Operation, Manual or Hydraulic jacking of shields and the use of such other mechanical equipment as may be necessary; Pavement Breakers; Paving, curbing and surfacing of streets, ways, courts, under and overpasses, bridges, approaches, slope walls, and all other labor connected therewith; Pilecutters; Pipe Accessment in place, bolting and lining up of sectional metal or other pipe including corrugated pipe; Pipelayer performing all services in the laying and installation of pipe from the point of receiving pipe in the ditch until completion of operation, including any and all forms of tubular material, whether pipe, HDPE, metallic or non-metallic, conduit, and any other stationary-type of tubular device used for conveying of any substance or element, whether water, sewage, solid, gas, air, or other product whatsoever and without regard to the nature of material from which tubular material is fabricated; No-joint pipe and stripping of same, Pipewrapper, Caulker, Bander, Kettlemen, and men applying asphalt, Laykold, treating Creosote and similar-type materials (6-inch) pipe and over); Piping: resurfacing and paving of all ditches in preparation for laying of all pipes; Pipe laying of lateral sewer pipe from main or side sewer to buildings or structure (except Contactor may direct work be done under proper supervision); Pipe laying, leveling and marking of the joint used for main or side sewers and storm sewers; Laying of all clay, terra cotta, ironstone, vitrified concrete, HDPE or other pipe for drainage; Placing and setting of water mains, gas mains and all pipe including removal of skids; Plaster Mortar Mixer/Pump; Pneumatic Impact Wrench; Portable Sawmill Operation: Choker setters, off bearers, and lumber handlers connected with clearing; Posthole Digger (Hand Held, Gas, Air and Electric); Powderman's Tender; Power Broom Sweepers (Small); Preparation and Compaction of roadbeds for railroad track laying, highway construction, and the preparation of trenches, footings, etc., for cross-country transmission by pipelines, electrical transmission or underground lines or cables (by mechanical means); Raising of structure by manual or hydraulic jacks or other methods and resetting of structure in new locations, including all concrete work; Ramming or compaction; Rigging in connection with Laborers' work (except demolition), Signaling (including the use of walkie talkie) Choke Setting, tag line usage; Tagging and Signaling of building materials into high rise units; Riprap, Stonepaver, and Rock Slinger (includes placement of stacked concrete, wet or dry and loading, unloading, signaling, slinging and setting of other similar materials); Rotary Scarifier (including multiple head concrete chipping Scarifier); Salamander Heater, Drying of plaster, concrete mortar or other aggregate; Scaffold Erector Leadman; Scaffolds: (Swing and hanging) including maintenance thereof; Scaler; Septic Tank/Cesspool and Drain Fields Digger and Installer;

Shredder/Chipper (tree branches, brush, etc.); Stripping and Setting Forms; Stripping of Forms: Other than panel forms which are to be re-used in their original form, and stripping of forms on all flat arch work; Tampers (Barko, Wacker, and similar type); Tank Scaler and Cleaners; Tarman; Tree Climbers and Trimmers; Trencher (includes hand-held, Davis T-66 and similar type); Trucks (flatbed up to and including 2 1/2 tons when used in connection with on-site Laborers' work; Trucks (Refuse and Garbage Disposal) (from job site to dump); Vibra-Screed (Bull Float in connection with Laborers' work); Well Points, Installation of or any other dewatering system.

Laborer II: Asphalt Plant Laborer; Boring Machine Tender; Bridge Laborer; Burning of all debris (crates, boxes, packaging waste materials); Chainman, Rodmen, and Grade Markers; Cleaning, clearing, grading and/or removal for streets, highways, roadways, aprons, runways, sidewalks, parking areas, airports, approaches, and other similar installations; Cleaning or reconditioning of streets, ways, sewers and waterlines, all maintenance work and work of an unskilled and semi-skilled nature; Concrete Bucket Tender (Groundman) hooking and unhooking of bucket; Concrete Forms; moving, cleaning, oiling and carrying to the next point of erection of all forms; Concrete Products Plant Laborers; Conveyor Tender (conveying of building materials); Crushed Stone Yards and Gravel and Sand Pit Laborers and all other similar plants; Demolition, Wrecking and Salvage Laborers: Wrecking and dismantling of buildings and all structures, with use of cutting or wrecking tools, breaking away, cleaning and removal of all fixtures, All hooking, unhooking, signaling of materials for salvage or scrap removed by crane or derrick; Digging under streets, roadways, aprons or other paved surfaces; Driller's Tender; Chuck Tender, Outside Nipper; Dry-packing of concrete (plugging and filling of she-bolt holes); Fence and/or Guardrail Erector: Dismantling and/or re-installation of all fence; Finegrader; Firewatcher; Flagman (Coning, preparing, establishing and removing portable roadway barricade devices); Signal Men on all construction work defined herein, including Traffic Control Signal Men at construction site; General Excavation; Backfilling, Grading and all other labor connected therewith; Digging of trenches, ditches and manholes and the leveling, grading and other preparation prior to laying pipe or conduit for any purpose; Excavations and foundations for buildings, piers, foundations and holes, and all other construction. Preparation of street ways and bridges; General Laborer: Cleaning and Clearing of all debris and surplus material. Clean-up of right-of-way. Clearing and slashing of brush or trees by hand or mechanical cutting. General Clean up: sweeping, cleaning, wash-down, wiping of construction facility and equipment (other than "Light Clean up (Janitorial) Laborer. Garbage and Debris Handlers and Cleaners. Appliance Handling (job site) (after delivery unloading in storage area); Ground and Soil Treatment Work (Pest Control); Gunite/Shotcrete Operator Tender; Junk Yard Laborers (same as Salvage Yard); Laser Beam "Target Man" in connection with Laborers' work; Layout Person for Plastic (when work involves waterproofing for waterponds, artificial lakes and reservoirs); Limbers, Brush Loaders, and Pilers; Loading, Unloading, carrying, distributing and handling of all rods and material for use in reinforcing concrete construction (except when a derrick or outrigger operated by other than hand power is used); Loading,

unloading, sorting, stockpiling, handling and distribution of water mains, gas mains and all pipes; Loading and unloading of all materials, fixtures, furnishings and appliances from point of delivery to stockpile to point of installation; hooking and signaling from truck, conveyance or stockpile; Material Yard Laborers; Pipelayer Tender; Pipewrapper, Caulker, Bander, Kettlemen, and men applying asphalt, Laykold, Creosote, and similar-type materials (pipe under 6 inches); Plasterer Laborer; Preparation, construction and maintenance of roadbeds and sub-grade for all paving, including excavation, dumping, and spreading of sub-grade material; Prestressed or precast concrete slabs, walls, or sections: all loading, unloading, stockpiling, hooking on of such slabs, walls or sections; Quarry Laborers; Railroad, Streetcar, and Rail Transit Maintenance and Repair; Roustabout; Rubbish Trucks in connection with Building Construction Projects (excluding clearing, grubbing, and excavating); Salvage Yard: All work connected with cutting, cleaning, storing, stockpiling or handling of materials, all cleanup, removal of debris, burning, back-filling and landscaping of the site; Sandblasting Tender (Pot Tender): Hoses and pots or markers; Scaffolds: Erection, planking and removal of all scaffolds used for support for lathers, plasters, brick layers, masons, and other construction trades crafts; Scaffolds: (Specially designed by carpenters) laborers shall tend said carpenter on erection and dismantling thereof, preparation for foundation or mudsills, maintenance; Scraping of floors; Screeds: Handling of all screeds to be reused; handling, dismantling and conveyance of screeds; Setting, leveling and securing or bracing of metal or other road forms and expansion joints; Sheeting Piling/trench shoring (handling and placing of skip sheet or wood plank trench shoring); Ship Scalers; Shipwright Tender; Sign Erector (subdivision traffic, regulatory, and street-name signs); Sloper; Slurry Seal Crews (Mixer Operator, Applicator, Squeegee Man, Shuttle Man, Top Man); Snapping of wall ties and removal of tie rods; Soil Test operations of semi and unskilled labor such as filling sand bags; Stripper (Asphalt, Concrete or other Paved Surfaces); Tool Room Attendant (Job Site); Traffic Delineating Device Applicator; Underpinning, lagging, bracing, propping and shoring, loading, signaling, right-of-way clearance along the route of movement, The clearance of new site, excavation of foundation when moving a house or structure from old site to new site; Utilities employees; Water Man; Waterscape/Hardscape Laborers; Wire Mesh Pulling (all concrete pouring operations); Wrecking, stripping, dismantling and handling concrete forms an false work.

LAB00368-002 09/03/2024

	Rates	Fringes
Landscape & Irrigation Laborers		
GROUP 1.....	\$ 28.40	17.15
GROUP 2.....	\$ 29.40	17.15
GROUP 3.....	\$ 23.00	17.15

LABORERS CLASSIFICATIONS

GROUP 1: Installation of non-potable permanent or temporary irrigation water systems performed for the purposes of

Landscaping and Irrigation architectural horticultural work; the installation of drinking fountains and permanent or temporary irrigation systems using potable water for Landscaping and Irrigation architectural horticultural purposes only. This work includes (a) the installation of all heads, risers, valves, valve boxes, vacuum breakers (pressure and non-pressure), low voltage electrical lines and, provided such work involves electrical wiring that will carry 24 volts or less, the installation of sensors, master control panels, display boards, junction boxes, conductors, including all other components for controllers, (b) and metallic (copper, brass, galvanized, or similar) pipe, as well as PVC or other plastic pipe including all work incidental thereto, i.e., unloading, handling and distribution of all pipes fittings, tools, materials and equipment, (c) all soldering work in connection with the above whether done by torch, soldering iron, or other means; (d) tie-in to main lines, thrust blocks (both precast and poured in place), pipe hangers and supports incidental to installation of the entire irrigation system, (e) making of pressure tests, start-up testing, flushing, purging, water balancing, placing into operation all irrigation equipment, fixtures and appurtenances installed under this agreement, and (f) the fabrication, replacement, repair and servicing of landscaping and irrigation systems. Operation of hand-held gas, air, electric, or self-powered tools and equipment used in the performance of Landscape and Irrigation work in connection with architectural horticulture; Choke-setting, signaling, and rigging for equipment operators on job-site in the performance of such Landscaping and Irrigation work; Concrete work (wet or dry) performed in connection with such Landscaping and Irrigation work. This work shall also include the setting of rock, stone, or riprap in connection with such Landscape, Waterscape, Rockscape, and Irrigation work; Grubbing, pick and shovel excavation, and hand rolling or tamping in connection with the performance of such Landscaping and Irrigation work; Sprigging, handseeding, and planting of trees, shrubs, ground covers, and other plantings and the performance of all types of gardening and horticultural work relating to said planting; Operation of flat bed trucks (up to and including 2 1/2 tons)..

GROUP 2. Layout of irrigation and other non-potable irrigation water systems and the layout of drinking fountains and other potable irrigation water systems in connection with such Landscaping and Irrigation work. This includes the layout of all heads, risers, valves, valve boxes, vacuum breakers, low voltage electrical lines, hydraulic and electrical controllers, and metallic (coppers, brass, galvanized, or similar) pipe, as well as PVC or other plastic pipe. This work also includes the reading and interpretation of plans and specifications in connection with the layout of Landscaping, Rockscape, Waterscape, and Irrigation work; Operation of Hydro-Mulching machines (sprayman and driver), Drillers, Trenchers (riding type, Davis T-66, and similar) and fork lifts used in connection with the performance of such Landscaping and Irrigation work; Tree climbers and chain saw tree trimmers, Sporadic operation (when used in connection with Landscaping, Rockscape, Waterscape, and Irrigation work) of Skid-Steer Loaders (Bobcat and similar), Cranes (Bantam, Grove, and similar), Hoptos, Backhoes, Loaders, Rollers, and Dozers (Case, John Deere, and similar), Water Trucks, Trucks requiring a State of

Hawaii Public Utilities Commission Type 5 and/or type 7 license, sit-down type and ""gang"" mowers, and other self-propelled, sit-down operated machines not listed under Landscape & Irrigation Maintenance Laborer; Chemical spraying using self-propelled power spraying equipment (200 gallon capacity or more).

GROUP 3: Maintenance of trees, shrubs, ground covers, lawns and other planted areas, including the replanting of trees, shrubs, ground covers, and other plantings that did not ""take"" or which are damaged; provided, however, that re-planting that requires the use of equipment, machinery, or power tools shall be paid for at the rate of pay specified under Landscape and Irrigation Laborer, Group 1; Raking, mowing, trimming, and runing, including the use of ""weed eaters"", hedge trimmers, vacuums, blowers, and other hand-held gas, air, electric, or self-powered tools, and the operation of lawn mowers (Note: The operation of sit-down type and ""gang"" mowers shall be paid for at the rate of pay specified under Landscape & Irrigation Laborer, Group 2); Guywiring, staking, propping, and supporting trees; Fertilizing, Chemical spraying using spray equipment with less than 200 gallon capacity, Maintaining irrigation and sprinkler systems, including the staking, clamping, and adjustment of risers, and the adjustment and/or replacement of sprinkler heads, (Note: the cleaning and gluing of pipe and fittings shall be paid for at the rate of pay specified under Landscape & Irrigation Laborer(Group 1); Watering by hand or sprinkler system and the performance of other types of gardening, yardman, and horticultural-related work.

LAB00368-003 09/02/2024

	Rates	Fringes
Underground Laborer		
GROUP 1.....	\$ 42.35	25.91
GROUP 2.....	\$ 43.85	25.91
GROUP 3.....	\$ 44.35	25.91
GROUP 4.....	\$ 45.35	25.91
GROUP 5.....	\$ 45.70	25.91
GROUP 6.....	\$ 45.95	25.91
GROUP 7.....	\$ 46.40	25.91

GROUP 1: Watchmen; Change House Attendant.

GROUP 2: Swamper; Brakeman; Bull Gang-Muckers, Trackmen; Dumpmen (any method); Concrete Crew (includes rodding and spreading); Grout Crew; Reboundmen

GROUP 3: Chucktenders and Cabletenders; Powderman (Prime House); Vibratorman, Pavement Breakers

GROUP 4: Miners - Tunnel (including top and bottom man on shaft and raise work); Timberman, Retimberman (wood or steel or substitute materials thereof); Blasters, Drillers, Powderman (in heading); Microtunnel Laborer; Headman; Cherry Pickerman (where car is lifted); Nipper; Grout Gunmen; Grout Pumpman & Potman; Gunite, Shotcrete Gunmen & Potmen; Concrete Finisher (in tunnel); Concrete Screed Man; Bit Grinder; Steel Form Raisers & Setters; High Pressure Nozzleman; Nozzleman (on slick line); Sandblaster-Potman (combination work assignment interchangeable); Tugger

GROUP 5: Shaft Work & Raise (below actual or excavated ground level); Diamond Driller; Guniting or Shotcrete Nozzlemen; Rodman; Groundman

GROUP 6: Shifter

GROUP 7: Shifter (Shaft Work & Raiser)

PAIN1791-001 07/01/2025		
	Rates	Fringes
Painters:		
Brush.....	\$ 44.05	30.05
Sandblaster; Spray.....	\$ 44.05	30.05

PAIN1889-001 07/01/2025		
	Rates	Fringes
Glaziers.....	\$ 48.50	40.20

PAIN1926-001 03/02/2025		
	Rates	Fringes
Soft Floor Layers.....	\$ 43.27	35.18

PAIN1944-001 01/01/2025		
	Rates	Fringes
Taper.....	\$ 47.36	32.00

PLAS0630-001 09/04/2023		
	Rates	Fringes
PLASTERER.....	\$ 46.12	34.53

PLAS0630-002 09/04/2023		
	Rates	Fringes
Cement Masons:		
Cement Masons.....	\$ 44.12	33.63
Trowel Machine Operators....	\$ 44.27	33.63

PLUM0675-001 07/06/2025		
	Rates	Fringes
Plumber, Pipefitter, Steamfitter & Sprinkler Fitter...	\$ 53.83	33.19

ROOF0221-001 11/06/2022		
	Rates	Fringes
Roofers (Including Built Up, Composition and Single Ply).....	\$ 43.15	21.21

SHEE0293-001 03/02/2025		

	Rates	Fringes
Sheet metal worker.....	\$ 50.16	33.32

SUHI1997-002 09/15/1997		

	Rates	Fringes
Drapery Installer.....	\$ 13.60	1.20
FENCE ERECTOR (Chain Link Fence).....	\$ 9.33	1.65

WELDERS - Receive rate prescribed for craft performing operation to which welding is incidental.

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Note: Executive Order (EO) 13706, Establishing Paid Sick Leave for Federal Contractors applies to all contracts subject to the Davis-Bacon Act for which the contract is awarded (and any solicitation was issued) on or after January 1, 2017. If this contract is covered by the EO, the contractor must provide employees with 1 hour of paid sick leave for every 30 hours they work, up to 56 hours of paid sick leave each year. Employees must be permitted to use paid sick leave for their own illness, injury or other health-related needs, including preventive care; to assist a family member (or person who is like family to the employee) who is ill, injured, or has other health-related needs, including preventive care; or for reasons resulting from, or to assist a family member (or person who is like family to the employee) who is a victim of, domestic violence, sexual assault, or stalking. Additional information on contractor requirements and worker protections under the EO is available at <https://www.dol.gov/agencies/whd/government-contracts>.

Note: Executive Order 13658 generally applies to contracts subject to the Davis-Bacon Act that were awarded on or between January 1, 2015 and January 29, 2022, and that have not been renewed or extended on or after January 30, 2022. Executive Order 13658 does not apply to contracts subject only to the Davis-Bacon Related Acts regardless of when they were awarded. If a contract is subject to Executive Order 13658, the contractor must pay all covered workers at least \$13.30 per hour (or the applicable wage rate listed on this wage determination, if it is higher) for all hours spent performing on the contract in 2025. The applicable Executive Order minimum wage rate will be adjusted annually. Additional information on contractor requirements and worker protections under Executive Order 13658 is available at www.dol.gov/whd/govcontracts.

Unlisted classifications needed for work not included within the scope of the classifications listed may be added after award only as provided in the labor standards contract clauses (29CFR 5.5 (a) (1) (iii)).

The body of each wage determination lists the classifications and wage rates that have been found to be prevailing for the type(s) of construction and geographic area covered by the wage

determination. The classifications are listed in alphabetical order under rate identifiers indicating whether the particular rate is a union rate (current union negotiated rate), a survey rate, a weighted union average rate, a state adopted rate, or a supplemental classification rate.

Union Rate Identifiers

A four-letter identifier beginning with characters other than ""SU"", ""UAVG"", ?SA?, or ?SC? denotes that a union rate was prevailing for that classification in the survey. Example: PLUM0198-005 07/01/2024. PLUM is an identifier of the union whose collectively bargained rate prevailed in the survey for this classification, which in this example would be Plumbers. 0198 indicates the local union number or district council number where applicable, i.e., Plumbers Local 0198. The next number, 005 in the example, is an internal number used in processing the wage determination. The date, 07/01/2024 in the example, is the effective date of the most current negotiated rate.

Union prevailing wage rates are updated to reflect all changes over time that are reported to WHD in the rates in the collective bargaining agreement (CBA) governing the classification.

Union Average Rate Identifiers

The UAVG identifier indicates that no single rate prevailed for those classifications, but that 100% of the data reported for the classifications reflected union rates. EXAMPLE: UAVG-OH-0010 01/01/2024. UAVG indicates that the rate is a weighted union average rate. OH indicates the State of Ohio. The next number, 0010 in the example, is an internal number used in producing the wage determination. The date, 01/01/2024 in the example, indicates the date the wage determination was updated to reflect the most current union average rate.

A UAVG rate will be updated once a year, usually in January, to reflect a weighted average of the current rates in the collective bargaining agreements on which the rate is based.

Survey Rate Identifiers

The ""SU"" identifier indicates that either a single non-union rate prevailed (as defined in 29 CFR 1.2) for this classification in the survey or that the rate was derived by computing a weighted average rate based on all the rates reported in the survey for that classification. As a weighted average rate includes all rates reported in the survey, it may include both union and non-union rates. Example: SUFL2022-007 6/27/2024. SU indicates the rate is a single non-union prevailing rate or a weighted average of survey data for that classification. FL indicates the State of Florida. 2022 is the year of the survey on which these classifications and rates are based. The next number, 007 in the example, is an internal number used in producing the wage determination. The date, 6/27/2024 in the example, indicates the survey completion date for the classifications and rates under that identifier.

?SU? wage rates typically remain in effect until a new survey is conducted. However, the Wage and Hour Division (WHD) has the discretion to update such rates under 29 CFR 1.6(c)(1).

State Adopted Rate Identifiers

The ""SA"" identifier indicates that the classifications and prevailing wage rates set by a state (or local) government were adopted under 29 C.F.R 1.3(g)-(h). Example: SAME2023-007 01/03/2024. SA reflects that the rates are state adopted. ME refers to the State of Maine. 2023 is the year during which the state completed the survey on which the listed classifications and rates are based. The next number, 007 in the example, is an internal number used in producing the wage determination. The date, 01/03/2024 in the example, reflects the date on which the classifications and rates under the ?SA? identifier took effect under state law in the state from which the rates were adopted.

WAGE DETERMINATION APPEALS PROCESS

1) Has there been an initial decision in the matter? This can be:

- a) a survey underlying a wage determination
- b) an existing published wage determination
- c) an initial WHD letter setting forth a position on a wage determination matter
- d) an initial conformance (additional classification and rate) determination

On survey related matters, initial contact, including requests for summaries of surveys, should be directed to the WHD Branch of Wage Surveys. Requests can be submitted via email to davisbaconinfo@dol.gov or by mail to:

Branch of Wage Surveys
Wage and Hour Division
U.S. Department of Labor
200 Constitution Avenue, N.W.
Washington, DC 20210

Regarding any other wage determination matter such as conformance decisions, requests for initial decisions should be directed to the WHD Branch of Construction Wage Determinations. Requests can be submitted via email to BCWD-Office@dol.gov or by mail to:

Branch of Construction Wage Determinations
Wage and Hour Division
U.S. Department of Labor
200 Constitution Avenue, N.W.
Washington, DC 20210

2) If an initial decision has been issued, then any interested party (those affected by the action) that disagrees with the decision can request review and reconsideration from the Wage and Hour Administrator (See 29 CFR Part 1.8 and 29 CFR Part 7). Requests for review and reconsideration can be submitted via email to dba.reconsideration@dol.gov or by mail to:

Wage and Hour Administrator
U.S. Department of Labor
200 Constitution Avenue, N.W.
Washington, DC 20210

The request should be accompanied by a full statement of the interested party's position and any information (wage payment

data, project description, area practice material, etc.) that the requestor considers relevant to the issue.

3) If the decision of the Administrator is not favorable, an interested party may appeal directly to the Administrative Review Board (formerly the Wage Appeals Board). Write to:

Administrative Review Board
U.S. Department of Labor
200 Constitution Avenue, N.W.
Washington, DC 20210.

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END OF GENERAL DECISION"

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION
HONOLULU, HAWAII

P R O P O S A L

6/02/98

**PROPOSAL TO THE
STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION**

PROJECT: Sand Island Access Road
Truck Weigh Station
District of Honolulu
Island of Oahu

PROJECT NO.: NH-064-1(010)R

COMPLETION TIME: 120 Calendar days from from the Start Work Date
from the Department.

DBE PROJECT GOAL: NONE SPECIFIED

DESIGN PROJECT MANAGER:

NAME: Amy Sunahara, P.E.
ADDRESS: 601 Kamokila Boulevard, Room 609
PHONE NO.: (808) 692-7575
EMAIL: amy.my.sunahara@hawaii.gov
FAX NO.: (808) 692-7590

ELECTRONIC SUBMITTAL:

Bidders shall submit and upload the complete proposal to HlePRO prior to the bid opening date and time. Any additional support documents explicitly designated as confidential and/or proprietary shall be uploaded as a separate file to HlePRO. See SPECIAL PROVISIONS 102.09 DELIVERY OF PROPOSALS for complete details. FAILURE TO UPLOAD THE COMPLETE PROPOSAL TO HlePRO SHALL BE GROUNDS FOR REJECTION OF THE BID.

Director of Transportation
869 Punchbowl Street
Honolulu, Hawaii 96813

Dear Sir:

The undersigned Bidder declares the following:

1. It has not, either directly or indirectly, entered into any agreement, participated in any collusion, or otherwise taken any action in restraint of free competitive bidding in connection with this proposal.
2. It has not been assisted or represented on this matter by any individual who has, in a State capacity, been involved in the subject matter of this contract within the past two years.
3. It has not and will not, either directly or indirectly offered or given a gratuity (i.e., an entertainment or gift) to any State or County employee to obtain a contract or favorable treatment under a contract.
4. It will not maintain for its employees any segregated facilities at any of its establishments.
5. Does not and will not permit its employees to perform their services at any location under its control, where segregated facilities are maintained.

The undersigned Bidder further agrees to the following:

1. If this proposal is accepted, it shall execute a contract with the Department to provide all necessary labor, machinery, tools, equipment, apparatus and any other means of construction, to do all the work and to furnish all the materials specified in the contract in the manner and within the time therein prescribed in the contract, and that it shall accept in full payment therefore the sum of the unit and/or lump sum prices as set forth in the attached proposal schedule for the actual quantities of work performed and materials furnished and furnish satisfactory security in accordance with Section 103D-324, Hawaii Revised Statutes, within 10 days after the award of the contract or within such time as the Director of Transportation may allow after the undersigned has received the contract documents for execution, and is fully aware that non-compliance with the aforementioned terms will result in the forfeiture of the full amount of the bid guarantee required under Section 1032D-323, Hawaii Revised Statutes.
2. That the quantities given in the attached proposal schedule are approximate only and are intended principally to serve as a guide in determining and comparing the bids.

3. That the Department does not either expressly or by implication, agree that the actual amount of work will correspond therewith, but reserves the right to increase or decrease the amount of any class or portion of the work, or to omit portions of the work, as may be deemed necessary or advisable by the Director of Transportation, and that all increased or decreased quantities of work shall be performed at the unit prices set forth in the attached proposal schedule except as provided for in the specifications.
4. In case of a discrepancy between unit prices and the totals in said Proposal Schedule, the unit prices shall prevail.
5. Unless amended by Special Provision, agrees to begin work within 10 working days after the date of notification to commence with the work, which date is in the notice to proceed, and shall finish the entire project within the time prescribed.
6. The Director of Transportation reserves the right to reject any or all bids and to waive any defects when in the Director's opinion such rejections or waiver will be for the best interest of the public.

The Bidder acknowledges receipt of and certifies that it has completely examined the following listed items: Hawaii Standard Specifications for Road and Bridge Construction, 2005, and/or the General Provisions for Construction Projects for AIR and WATER Transportation Facilities Division dated 2016, as applicable, the Notice to Bidders, Special Provisions, Proposal, Contract, Bond Forms, and Project Plans.

In accordance with Section 103D-323, Hawaii Revised Statutes, this proposal is accompanied with a bid security in the amount of 5% of the total amount bid, in the form checked below. (Check applicable bid security submitted with bid.)

_____ Surety Bid Bond (Use standard form),

_____ Cash,

_____ Cashier's Check,

_____ Certified Check, or

_____ (Fill in other acceptable security.)

The undersigned Bidder acknowledges receipt of any addendum issued by the Department by recording in the space below the date of receipt.

Addendum No. 1 _____ Addendum No. 3 _____

Addendum No. 2 _____ Addendum No. 4 _____

In accordance with Section 103D-302, Hawaii Revised Statutes, the undersigned as Bidder has listed the name of each person or firm who will be engaged by the Bidder on the project as Subcontractor or Joint Contractor and the nature of work to be done by each on the following page. The Bidder must adequately and unambiguously disclose the unique nature and scope of the work to be performed by each Subcontractor or Joint Contractor. For each listed firm, the Bidder declares the respective firm is a Subcontractor or Joint Contractor and is subject to evaluation as a Subcontractor or Joint Contractor. It is understood that failure to comply with the aforementioned requirements may be cause for rejection of the bid submitted.

SUBCONTRACTOR LISTING
(Attach additional sheets if necessary.)

	NAME OF FIRM	NATURE OF WORK
SUBCONTRACTOR:		
1.	_____	_____
	1a ¹ . _____	_____
2.	_____	_____
	2a. _____	_____
3.	_____	_____
	3a. _____	_____
4.	_____	_____
	4a. _____	_____
5.	_____	_____
	5a. _____	_____
6.	_____	_____
	6a. _____	_____
7.	_____	_____
	7a. _____	_____

NOTES:

The Name of Firm and Nature of Work shall be indicated for all listed firms. The Bidder must adequately and unambiguously disclose the unique nature and scope of the work to be performed by each Sub- or Joint Contractor.

For each listed firm, the Bidder declares the respective firm is a Sub- or Joint Contractor and subject to evaluation as a Sub- or Joint Contractor.

¹ Second tier subcontractors

JOINT CONTRACTOR LISTING
(Attach additional sheets if necessary.)

	NAME OF FIRM	NATURE OF WORK
JOINT CONTRACTOR:		
1.	_____	_____
	1a ¹ . _____	_____
2.	_____	_____
	2a. _____	_____
3.	_____	_____
	3a. _____	_____
4.	_____	_____
	4a. _____	_____
5.	_____	_____
	5a. _____	_____
6.	_____	_____
	6a. _____	_____
7.	_____	_____
	7a. _____	_____

NOTES:

The Name of Firm and Nature of Work shall be indicated for all listed firms. The Bidder must adequately and unambiguously disclose the unique nature and scope of the work to be performed by each Sub- or Joint Contractor.

For each listed firm, the Bidder declares the respective firm is a Sub- or Joint Contractor and subject to evaluation as a Sub- or Joint Contractor.

¹ Second tier joint contractors

The undersigned hereby certifies that the bid prices contained in the attached proposal schedule have been carefully checked and are submitted as correct and final.

This declaration is made with the understanding that the undersigned is subject to the penalty of perjury under the laws of the United States and is in violation of the Hawaii Penal Code, Section 710-1063, unsworn falsification to authorities, of the Hawaii Revised Statutes, for knowingly rendering a false declaration.

Bidder (Company Name)

Authorized Signature

Title

Business Address

Business Telephone

Email

Date

Contact Person (If different from above.)

Phone: _____ Email: _____

NOTE:

If Bidder is a CORPORATION, the legal name of the corporation shall be set forth above, the corporate seal affixed, together with the signature(s) of the officer(s) authorized to sign contracts for the corporation. Please attach to this page current (not more than six months old) evidence of the authority of the officer(s) to sign for the corporation.

If Bidder is a PARTNERSHIP, the true name of the partnership shall be set forth above, with the signature(s) of the general partner(s). Please attach to this page current (not more than six months old) evidence of the authority of the partner authorized to sign for the partnership.

If Bidder is an INDIVIDUAL, the bidder's signature shall be placed above.

If signature is by an agent, other than an officer of a corporation or a partner of a partnership, a POWER OF ATTORNEY must be on file with the Department before opening bids or submitted with the bid. Otherwise, the Department may reject the bid as irregular and unauthorized.

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
201.2000	Clearing and Grubbing	1867	S.F.	\$ _____	\$ _____
202.0100	Demolition and Removal of Existing Street Sign (Including Foundation)	1	Each	\$ _____	\$ _____
202.0200	Demolition and Removal of Existing Concrete (Assume 3" Sidewalk and Adjacent Mow Strip)	660	S.F.	\$ _____	\$ _____
202.0300	Demolition and Removal of Existing Fence (Including Foundations)	464	L.F.	\$ _____	\$ _____
202.0400	Demolition and Removal of Existing Asphalt Pavement and Base Material (10" Asphalt/12" Base)	3262	S.F.	\$ _____	\$ _____
202.0500	Demolition and Removal of Existing Concrete Curb	168	L.F.	\$ _____	\$ _____
202.0600	Saw Cut and Removal of Existing Pavement (Asphalt and Concrete)	1402	L.F.	\$ _____	\$ _____
202.0700	Demolish and Removal of 4" Wide Striping	4970	L.F.	\$ _____	\$ _____
202.0800	Demolish and Removal of Pavement Arrow Striping	11	Each	\$ _____	\$ _____
202.0900	Demolish and Removal Roadway Raised Pavement Markers	303	Each	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
203.0100	Excavation (Cut)	131	C.Y.	\$ _____	\$ _____
209.0100	Installation, Maintenance, Monitoring, and Removal of BMP	L.S.	L.S.	L.S.	\$ _____
209.0200	Additional Water Pollution, Dust, and Erosion Control	F.A.	F.A.	F.A.	\$ <u>15,000.00</u>
301.0100	Asphalt Concrete Base, 10" Thick	75	Ton	\$ _____	\$ _____
304.0100	6" Aggregate Base Course	78	C.Y.	\$ _____	\$ _____
401.0100	PMA Pavement, Mix No. IV (w/ PG 64E-22)	40	Ton	\$ _____	\$ _____
401.0200	Asphalt Overlay, Mix No. IV (2" Minimum, 4" Maximum)	73	Ton	\$ _____	\$ _____
411.1001	Portland Cement Concrete, 12" Thick	92	C.Y.	\$ _____	\$ _____
503.1001	Concrete for Electrical Service Box	9	Each	\$ _____	\$ _____
503.1002	Concrete for Electrical Equipment Foundations	3	Each	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
503.1003	Concrete for Signal Pole Foundations	L.S.	L.S.	L.S.	\$ _____
503.1004	Concrete for Camera Pole Foundations	L.S.	L.S.	L.S.	\$ _____
607.0060	6-Feet, Chain Link Fence	59	L.F.	\$ _____	\$ _____
607.6100	Chain Link Gate, 6-Feet High and 12-Feet Wide	1	Each	\$ _____	\$ _____
610.0100	12" Reinforced Concrete Driveway	1	Each	\$ _____	\$ _____
627.1001	Management of Contaminated Materials	L.S.	L.S.	L.S.	\$ _____
627.1002	Additional Management of Contaminated Materials	F.A.	F.A.	F.A.	\$ <u>10,000.00</u>
629.1010	4-Inch Pavement White Striping (Thermoplastic Extrusion)	4189	L.F.	\$ _____	\$ _____
629.1011	4-Inch Pavement Yellow Striping (Thermoplastic Extrusion)	1246	L.F.	\$ _____	\$ _____
629.1012	4-Inch Dashed Pavement White Striping (Thermoplastic Extrusion)	797	L.F.	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
629.1013	8-Inch Pavement White Striping (Thermoplastic Extrusion)	1211	L.F.	\$ _____	\$ _____
629.1014	12-Inch Pavement White Striping (Thermoplastic Extrusion)	284	L.F.	\$ _____	\$ _____
629.2001	Pavement Symbol White (Thermoplastic Extrusion) (Yield Triangle)	15	Each	\$ _____	\$ _____
629.2002	Pavement Symbol White (Thermoplastic Extrusion) (Arrow)	11	Each	\$ _____	\$ _____
629.2003	Pavement Stop Bar and Lettering, White (Thermoplastic Extrusion)	1	Each	\$ _____	\$ _____
631.1001	Traffic Control Regulator Warning and Miscellaneous Sign	5	Each	\$ _____	\$ _____
632.1001	Roadway Raised Pavement Markers	303	Each	\$ _____	\$ _____
632.1002	Flexible Delineator Post and Reflector, 3-Feet High	31	Each	\$ _____	\$ _____
636.1000	Additional E-Construction Programs, additional licenses or additional equipment	F.A.	F.A.	F.A.	\$ <u>10,000.00</u>
638.1001	6" Concrete Curb	183	L.F.	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
638.1002	6" Concrete Curb and Gutter	190	L.F.	\$ _____	\$ _____
638.1003	4' Wide Concrete Through Gutter	129	L.F.	\$ _____	\$ _____
645.1000	Traffic Control	L.S.	L.S.	L.S.	\$ _____
645.2000	Additional Police Officers, Additional Traffic Control Devices, and Advertisement	F.A.	F.A.	F.A.	\$ <u>50,000.00</u>
648.1000	Field-Posted Drawings	L.S.	L.S.	L.S.	\$ _____
651.1001	Exterior Electrical Work	L.S.	L.S.	L.S.	\$ _____
651.8001	Utility Company Service Charge	F.A.	F.A.	F.A.	\$ <u>50,000.00</u>
679.1001	Weigh-In Motion System	L.S.	L.S.	L.S.	\$ _____
679.1002	3-Year Wireless Data Plan	L.S.	L.S.	L.S.	\$ _____
695.1001	Portable Concrete Barrier, 20-Ft	20	Each	\$ _____	\$ _____

PROPOSAL SCHEDULE

ITEM NO.	ITEM	APPROX. QUANTITY	UNIT	UNIT PRICE	AMOUNT
699.1000	Mobilization (Not to Exceed 6 Percent of the Sum of All Items Excluding the Bid Price of this Item)	L.S.	L.S.	L.S.	\$ _____
Total Amount for Comparison of Bids..... \$ _____ NOTE: Bidders shall complete all unit prices and amounts. Failure to do so shall be grounds for rejection of bid.					

1 **PROPOSAL SCHEDULE**

2
3 The bidder is directed to Subsection 105.16 – Subcontracts.

4
5 The bidder's attention is directed to 699 - Mobilization for the limitation of
6 the amount bidders are allowed to bid.

7
8 If the bid price for any proposal item having a maximum allowable bid
9 indicated therefore in any of the contract documents is in excess of such a
10 maximum amount, the bid price for such proposal item shall be adjusted to reflect
11 the limitation thereon. The comparison of bids to determine the successful bidder
12 and the amount of contract to be awarded shall be determined after such
13 adjustments are made, and such adjustments shall be binding upon the bidder.

14
15 The bidder is directed to Section 717 – Cullet and Cullet-Made Materials
16 regarding recycling of waste glass.

17
18 Notes:

- 19 1. Bids shall include all Federal, State, County and other applicable taxes
20 and fees.
21
22 2. The TOTAL AMOUNT FOR COMPARISON OF BIDS shall be used to
23 determine the lowest responsible bidder.
24
25 3. Bidders shall complete all unit prices and amounts. Failure to do so shall
26 be grounds for rejection of bid.
27
28 4. If a discrepancy occurs between unit bid price and the bid price, the unit
29 bid price shall govern.
30
31 5. **Bidders shall submit and upload the complete proposal to HlePRO**
32 **prior to the bid opening date and time. Proposals received after said**
33 **due date and time shall not be considered. Any additional support**
34 **documents explicitly designated as confidential and/or proprietary**
35 **shall be uploaded as a separate file to HlePRO. Bidders shall not**
36 **include confidential and/or proprietary documents with the proposal.**
37 **The record of each bidder and respective bid shall be open to public**
38 **inspection. Original (wet ink, hard copy) proposal documents are not**
39 **required to be submitted. Contract award shall be based on evaluation**
40 **of proposals submitted and uploaded to HlePRO.**
41 **FAILURE TO UPLOAD THE COMPLETE PROPOSAL TO HlePRO**
42 **SHALL BE GROUNDS FOR REJECTION OF THE BID.**

43 If there is a conflict between the specification document and the HlePRO
44 solicitation, the specifications shall govern and control, unless otherwise
45 specified.

SURETY BID BOND

Bond No. _____

KNOW ALL BY THESE PRESENTS:

That we, _____
(Full name or legal title of offeror)

as Offeror, hereinafter called the Principal, and

(Name of bonding company)
as Surety, hereinafter called Surety, a corporation authorized to transact business as a
Surety in the State of Hawaii, are held and firmly bound unto

(State/county entity)
as Owner, hereinafter called Owner, in the penal sum of

(Required amount of bid security)
Dollars (\$ _____), lawful money of the United States of
America, for the payment of which sum well and truly to be made, the said Principal and
the said Surety bind ourselves, our heirs, executors, administrators, successors and
assigns, jointly and severally, firmly by these presents.

WHEREAS:

The Principal has submitted an offer for _____

(Project by number and brief description)

NOW, THEREFORE:

The condition of this obligation is such that if the Owner shall reject said offer, or
in the alternate, accept the offer of the Principal and the Principal shall enter into a
contract with the Owner in accordance with the terms of such offer, and give such bond
or bonds as may be specified in the solicitation or Contract Documents with good and
sufficient surety for the faithful performance of such Contract and for the prompt
payment of labor and material furnished in the prosecution thereof as specified in the
solicitation then this obligation shall be null and void, otherwise to remain in full force
and effect.

Signed this _____ day of _____, _____

(Seal) _____
Name of Principal (Offeror)

Signature

Title

(Seal) _____
Name of Surety

Signature

Title

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HONOLULU, HAWAII

SAMPLE FORMS

Contract

Performance Bond (Surety)

Performance Bond

Labor and Material Payment Bond (Surety)

Labor and Material Payment Bond

Disclosure of Lobbying Activities (Standard Form - LLL and LLL-A)

Statement of Compliance (Form WH-348)

Chapter 104, HRS Compliance Certificate

C O N T R A C T

THIS AGREEMENT, made this day _____, by and between the
STATE OF HAWAII, by its Director of Transportation, hereinafter referred to as "STATE",
and «CONTRACTOR», «STATE_OF_INCORPORATON», whose business/post office
address is «ADDRESS» hereinafter referred to as "CONTRACTOR",

WITNESSETH: That for and in consideration of the payments hereinafter mentioned, the
CONTRACTOR hereby covenants and agrees with the STATE to complete in place, furnish
and pay for all labor and materials necessary for

“«PROJECT_NAME_AND_NO»”,

or such a part thereof as shall be required by the STATE, the total amount of which labor,
materials and construction shall be computed at the unit and/or lump sum prices set forth in the
attached proposal schedule and shall be the sum of «BASIC»----- DOLLARS

(\$«BASIC_NUMERIC») as follows:

TOTAL AMOUNT FOR COMPARISON OF BIDS.....\$«BASIC_NUMERIC»

which shall be provided from the following funds:

Federal Funds.....
State Funds.....
TOTAL AMOUNT.....

all in accordance with the specifications, the special provisions, if any, the notice to bidders, the instructions to bidders, the proposal and plans for «PROJECT NO ONLY», and any supplements thereto, on file in the office of the Director of Transportation. These documents, together with all alterations, amendments, and additions thereto and deductions therefrom, are attached hereto or incorporated herein by reference and made a part of this contract.

The CONTRACTOR hereby covenants and agrees to complete such construction within «WORKING DAYS», from the date indicated in the notice to proceed from the STATE, subject, however, to such extensions as may be provided for under the specifications.

For and in consideration of the covenants, undertakings and agreements of the CONTRACTOR herein set forth and upon the full and faithful performance thereof by the CONTRACTOR, the STATE hereby agrees to pay the CONTRACTOR the sum of «BASIC»-----DOLLARS (\$«BASIC NUMERIC») in lawful money, but not more than such part of the same as is actually earned according to the STATE's determination of the actual quantities of work performed and materials furnished by the CONTRACTOR at the unit or lump sum prices set forth in the attached proposal schedule. Such payment, including any extras, shall be made, subject to such additions or deductions hereto or hereafter made in the manner and at the time prescribed in the specifications and this contract.

An additional sum of «EXTRAS»-----DOLLARS (\$«EXTRA NUMERIC») is hereby provided for extra work and shall be provided from the following funds:

Federal Funds.....
State Funds.....
Total.....

Where Federal funds are involved, it is covenanted and agreed by and between the parties hereto that the sum of ----«FEDERAL_BASIC»----DOLLARS (\$«FEDERAL_BASIC_NUMERIC») and ----«FEDERAL_EXTRAS»----DOLLARS (\$«FEDERAL_EXTRAS_NUMERIC»), a portion of the contract price and extras, respectively, shall be paid out of the applicable Federal funds, and that this contract shall be construed to be an agreement to pay said sums to the Contractor only out of the aforesaid Federal funds if and when such Federal funds shall be received from the Federal Government, and that this contract shall not be construed to be a general agreement to pay said portions at all events out of any funds other than those which may be so received from the Federal Government; provided, that if the Federal share of the cost of the project is not immediately forthcoming from the Federal Government, the STATE may advance the CONTRACTOR the anticipated Federal reimbursement of the cost of the completed portions of the work from funds which have been appropriated by the STATE for its pro rata share.

All words used herein in the singular shall extend to and include the plural. All words used in the plural shall extend to and include the singular. The use of any gender shall extend to and include all genders.

IN WITNESS WHEREOF, the parties hereto have caused this instrument to be duly executed the day and year first above written.

STATE OF HAWAII

Director of Transportation

«CONTRACTOR»

Signature

Print name

Print Title

Date

PERFORMANCE BOND (SURETY)
(6/21/07)

KNOW TO ALL BY THESE PRESENTS:

That _____,
(Full Legal Name and Street Address of Contractor)

as Contractor, hereinafter called Principal, and _____

(Name and Street Address of Bonding Company)

as Surety, hereinafter called Surety, a corporation(s) authorized to transact business as a
surety in the State of Hawaii, are held and firmly bound unto the _____,
(State/County Entity)

its successors and assigns, hereinafter called Obligee, in the amount of _____

_____ DOLLARS (\$ _____), to which payment Principal and Surety bind themselves,
their heirs, executors, administrators, successors and assigns, jointly and severally, firmly by
these presents.

WHEREAS, the above-bound Principal has signed a Contract with Obligee on
_____, for the following project: _____

hereinafter called Contract, which Contract is incorporated herein by reference and made a part
hereof.

NOW THEREFORE, the condition of this obligation is such that:

If the Principal shall promptly and faithfully perform, and fully complete the Contract in
strict accordance with the terms of the Contract as said Contract may be modified or amended
from time to time; then this obligation shall be void; otherwise to remain in full force and effect.

Surety to this Bond hereby stipulates and agrees that no changes, extensions of time, alterations, or additions to the terms of the Contract, including the work to be performed thereunder, and the specifications or drawings accompanying same, shall in any way affect its obligation on this bond, and it does hereby waive notice of any such changes, extensions of time, alterations, or additions, and agrees that they shall become part of the Contract.

In the event of Default by the Principal, of the obligations under the Contract, then after written Notice of Default from the Obligee to the Surety and the Principal and subject to the limitation of the penal sum of this bond, Surety shall remedy the Default, or take over the work to be performed under the Contract and complete such work, or pay moneys to the Obligee in satisfaction of the surety's performance obligation on this bond.

Signed this _____ day of _____, _____.

(Seal)

Name of Principal (Contractor)

*

Signature

Title

(Seal)

Name of Surety

*

Signature

Title

*ALL SIGNATURES MUST BE ACKNOWLEDGED
BY A NOTARY PUBLIC

PERFORMANCE BOND

KNOW TO ALL BY THESE PRESENTS:

That we, _____
(full legal name and street address of Contractor)

as Contractor, hereinafter called Contractor, is held and firmly bound unto the

(State/County entity)

its successors and assigns, as Obligee, hereinafter called Obligee, in the amount

(Dollar amount of Contract) DOLLARS \$ _____),

lawful money of the United States of America, for the payment of which to the said Obligee, well and truly to be made, Contractor binds itself, its heir, executors, administrators, successors and assigns, firmly by these presents. Said amount is evidenced by:

- ☐ **Legal Tender;**
- ☐ **Share Certificate** unconditionally assigned to or made payable at sight to
Description: _____;
- ☐ **Certificate of Deposit**, No. _____, dated _____ issued
by _____ drawn on _____ a bank, savings
institution or credit union insured by the Federal Deposit Insurance Corporation or the
National Credit Union Administration, payable at sight or unconditionally assigned to
_____;
- ☐ **Cashier's Check** No. _____, dated _____
drawn on _____ a
bank, savings institution or credit union insured by the Federal Deposit Insurance
Corporation or the National Credit Union Administration, payable at sight or
unconditionally assigned to _____;
- ☐ **Teller's Check** No. _____, dated _____
drawn on _____ a
bank, savings institution or credit union insured by the Federal Deposit Insurance
Corporation or the National Credit Union Administration, payable at sight or
unconditionally assigned to _____;
- ☐ **Treasurer's Check** No. _____, dated _____
drawn on _____ a
bank, savings institution or credit union insured by the Federal Deposit Insurance
Corporation or the National Credit Union Administration, payable at sight or
unconditionally assigned to _____;
- ☐ **Official Check** No. _____, dated _____
drawn on _____ a
bank, savings institution or credit union insured by the Federal Deposit Insurance
Corporation or the National Credit Union Administration, payable at sight or
unconditionally assigned to _____;
- ☐ **Certified Check** No. _____, dated _____
accepted by a bank, savings institution or credit union insured by the Federal Deposit
Insurance Corporation or the National Credit Union Administration, payable at sight or
unconditionally assigned to _____;

WHEREAS:

The Contractor has by written agreement dated _____ entered into a contract with Obligee for the following Project: _____

hereinafter called Contract, which Contract is incorporated herein by reference and made a part hereof.

NOW THEREFORE,

The Condition of this obligation is such that, if Contractor shall promptly and faithfully perform the Contract in accordance with, in all respects, the stipulations, agreements, covenants and conditions of the Contract as it now exists or may be modified according to its terms, and shall deliver the Project to the Obligee, or to its successors or assigns, fully completed as in the Contract specified and free from all liens and claims and without further cost, expense or charge to the Obligee, its officers, agents, successors or assigns, free and harmless from all suits or actions of every nature and kind which may be brought for or on account of any injury or damage, direct or indirect, arising or growing out of the doing of said work or the repair or maintenance thereof or the manner of doing the same or the neglect of the Contractor or its agents or servants or the improper performance of the Contract by the Contractor or its agents or servants or from any other cause, then this obligation shall be void; otherwise it shall be and remain in full force and effect.

AND IT IS HEREBY STIPULATED AND AGREED that suit on this bond may be brought before a court of competent jurisdiction without a jury, and that the sum or sums specified in the said Contract as liquidated damages, if any, shall be forfeited to the Obligee, its successors or assigns, in the event of a breach of any, or all, or any part of, covenants, agreements, conditions, or stipulations contained in the Contract or in this bond in accordance with the terms thereof.

The amount of this bond may be reduced by and to the extent of any payment or payments made in good faith hereunder.

Signed and sealed this _____ day of _____, _____.

(Seal) _____
Name of Contractor

Signature*

Title

*ALL SIGNATURES MUST BE ACKNOWLEDGED
BY A NOTARY PUBLIC

LABOR AND MATERIAL PAYMENT BOND (SURETY)
(6/21/07)

KNOW TO ALL BY THESE PRESENTS:

That _____,
(Full Legal Name and Street Address of Contractor)

as Contractor, hereinafter called Principal, and _____

_____,
(Name and Street Address of Bonding Company)

as Surety, hereinafter called Surety, a corporation(s) authorized to transact business as a surety in the State of Hawaii, are held and firmly bound unto the _____,
(State/County Entity)

its successors and assigns, hereinafter called Obligee, in the amount of _____

_____ Dollars (\$ _____), to which payment Principal and Surety bind themselves, their heirs, executors, administrators, successors and assigns, jointly and severally, firmly by these presents.

WHEREAS, the above-bound Principal has signed Contract with the Obligee on _____ for the following project: _____

_____ hereinafter called Contract, which Contract is incorporated herein by reference and made a part hereof.

NOW THEREFORE, the condition of this obligation is such that if the Principal shall promptly make payment to any Claimant, as hereinafter defined, for all labor and materials supplied to the Principal for use in the performance of the Contract, then this obligation shall be void; otherwise to remain in full force and effect.

1. Surety to this Bond hereby stipulates and agrees that no changes, extensions of time, alterations, or additions to the terms of the Contract, including the work to be performed thereunder, and the specifications or drawings accompanying same, shall in any way affect its obligation on this bond, and it does hereby waive notice of any such changes, extensions of time, alterations, or additions, and agrees that they shall become part of the Contract.

2. A "Claimant" shall be defined herein as any person who has furnished labor or materials to the Principal for the work provided in the Contract.

Every Claimant who has not been paid amounts due for labor and materials furnished for work provided in the Contract may institute an action against the Principal and its Surety on this bond at the time and in the manner prescribed in Section 103D-324, Hawaii Revised Statutes, and have the rights and claims adjudicated in the action, and judgment rendered thereon; subject to the Obligee's priority on this bond. If the full amount of the liability of the Surety on this bond is insufficient to pay the full amount of the claims, then after paying the full amount due the Obligee, the remainder shall be distributed pro rata among the claimants.

Signed this _____ day of _____, _____.

(Seal)

Name of Principal (Contractor)

*

Signature

Title

(Seal)

Name of Surety

*

Signature

Title

*ALL SIGNATURES MUST BE ACKNOWLEDGED
BY A NOTARY PUBLIC

LABOR AND MATERIAL PAYMENT BOND

KNOW ALL BY THESE PRESENTS:

That we, _____
(full legal name and street address of Contractor)
as Contractor, hereinafter called Contractor, is held and firmly bound unto _____
(State/County entity)
its successors and assigns, as Obligee, hereinafter called Obligee, in the amount

(Dollar amount of Contract) DOLLARS (\$ _____),

lawful money of the United States of America, for the payment of which to the said Obligee, well and truly to be made, Contractor binds itself, its heir, executors, administrators, successors and assigns, firmly by these presents. Said amount is evidenced by:

- ☐ **Legal Tender;**
- ☐ **Share Certificate** unconditionally assigned to or made payable at sight to _____
Description: _____
- ☐ **Certificate of Deposit, No.** _____, dated _____
issued by _____
drawn on _____
a bank, savings institution or credit union insured by the Federal Deposit Insurance Corporation or the National Credit Union Administration, payable at sight or unconditionally assigned to _____;
- ☐ **Cashier's Check No.** _____, dated _____
drawn on _____
a bank, savings institution or credit union insured by the Federal Deposit Insurance Corporation or the National Credit Union Administration, payable at sight or unconditionally assigned to _____;
- ☐ **Teller's Check No.** _____, dated _____
drawn on _____
a bank, savings institution or credit union insured by the Federal Deposit Insurance Corporation or the National Credit Union Administration, payable at sight or unconditionally assigned to _____;
- ☐ **Treasurer's Check No.** _____, dated _____
drawn on _____
a bank, savings institution or credit union insured by the Federal Deposit Insurance Corporation or the National Credit Union Administration, payable at sight or unconditionally assigned to _____;
- ☐ **Official Check No.** _____, dated _____
drawn on _____
a bank, savings institution or credit union insured by the Federal Deposit Insurance Corporation or the National Credit Union Administration, payable at sight or unconditionally assigned to _____;
- ☐ **Certified Check No.** _____, dated _____
accepted by a bank, savings institution or credit union insured by the Federal Deposit Insurance Corporation or the National Credit Union Administration, payable at sight or unconditionally assigned to _____;

WHEREAS:

The Contractor has by written agreement dated _____
entered into a contract with Obligee for the following Project: _____

hereinafter called Contract, which Contract is incorporated herein by reference and made a part hereof.

NOW THEREFORE,

The condition of this obligation is such that, if Contractor shall promptly and faithfully perform the Contract in accordance with, in all respects, the stipulations, agreements, covenants and conditions of the Contract as it now exists or may be modified according to its terms, free from all liens and claims and without further cost, expense or charge to the Obligee, its officers, agents, successors or assigns, free and harmless from all suits or actions of every nature and kind which may be brought for or on account of any injury or damage, direct or indirect, arising or growing out of the doing of said work or the repair or maintenance thereof or the manner of doing the same or the neglect of the Contractor or its agents or servants or the improper performance of the Contract by the Contractor or its agents or servants or from any other cause, then this obligation shall be void; otherwise it shall be and remain in full force and effect.

AND IT IS HEREBY STIPULATED AND AGREED that suit on this bond may be brought before a court of competent jurisdiction without a jury, and that the sum or sums specified in the said Contract as liquidated damages, if any, shall be forfeited to the Obligee, its successors or assigns, in the event of a breach of any, or all, or any part of, covenants, agreements, conditions, or stipulations contained in the Contract or in this bond in accordance with the terms thereof.

AND IT IS HEREBY STIPULATED AND AGREED that this bond shall inure to the benefit of any and all persons entitled to file claims for labor performed or materials furnished in said work so as to give any and all such persons a right of action as contemplated by Sections 103D-324(d) and 103D-324(e), Hawaii Revised Statutes.

The amount of this bond may be reduced by and to the extent of any payment or payments made in good faith hereunder, inclusive of the payments of mechanics' liens which may be filed of record against the Project, whether or not claim for the amount of such lien be presented under and against this bond.

Signed this _____ day of _____, _____.

(Seal) _____
Name of Contractor

* _____
Signature

Title

*ALL SIGNATURES MUST BE
ACKNOWLEDGED BY A NOTARY PUBLIC

DISCLOSURE OF LOBBYING ACTIVITIES

Complete this form to disclose lobbying activities pursuant to 31 U.S.C. 1352
(See reverse for public burden disclosure.)

Approved by
0348-0046

1. Type of Federal Action: ☐ a. contract ☐ b. grant ☐ c. cooperative agreement ☐ d. loan ☐ e. loan guarantee ☐ f. loan insurance	2. Status of Federal Action: ☐ a. bid/offer/application ☐ b. initial award ☐ c. post-award	3. Report Type: ☐ a. initial filing ☐ b. material change For Material Change Only: year _____ quarter _____ date of last report _____
4. Name and Address of Reporting Entity: ☐ Prime ☐ Subawardee Tier _____, <i>if known</i> : Congressional District, <i>if known</i> :		5. If Reporting Entity in No. 4 is Subawardee, Enter Name and Address of Prime Congressional District, <i>if known</i> :
6. Federal Department/Agency:	7. Federal Program Name/Destination: CFDA Number, <i>if applicable</i> :	
8. Federal Action Number, <i>if known</i>:	9. Award Amount, <i>if known</i>: \$	
10. a. Name and address of Lobbying Entity (<i>if individual, last name, first name, MI</i>): (attach Continuation Sheet(s) SF-LLL-A, if necessary)		
11. Amount of Payment (<i>check all that apply</i>): \$ _____ ☐ actual ☐ planned	13. Type of Payment (<i>check all that apply</i>): ☐ a. retainer ☐ b. one-time fee ☐ c. commission ☐ d. contingent fee ☐ e. deferred ☐ f. other; specify: _____	
12. Form of Payment (<i>check all that apply</i>): ☐ a. cash ☐ b. in-kind; specify: nature _____ value _____		
14. Brief Description of Services Performed or to be Performed and Date(s) of Service, including officer(s), employees(s) or Member(s) contacted, for Payment Indicated in Item 11: (attach Continuation Sheet(s) SF-LLL-A, if necessary)		
15. Continuation Sheet(s) SF-LLL-A attached: ☐ Yes ☐ No		
16. Information requested through this form is authorized by title 31 U.S.C. section 1352. This disclosure of lobbying activities is a material representation of fact upon which reliance was placed by the tier above when this transaction was made or entered into. This disclosure is required pursuant to 31 U.S.C. 1352. This information will be reported to the Congress semi-annually and will be available for public inspection. Any person who fails to file the required disclosure shall be subject to a civil penalty of not less than \$10,000 and not more than \$100,000 for each such failure.	Signature: _____ Print Name: _____ Title: _____ Telephone No.: _____ Date: _____	
Federal Use Only:		Authorized for Local Reproduction Standard Form - LLL

INSTRUCTIONS FOR COMPLETION OF SF-LLL, DISCLOSURE OF LOBBYING ACTIVITIES

This disclosure form shall be completed by the reporting entity, whether subawardee or prime Federal recipient, at the initiation or receipt of a covered Federal action, or a material change to a previous filing, pursuant to title 31 U.S.C. section 1352. The filing of a form is required for each payment or agreement to make payment to any lobbying entity for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress in connection with a covered Federal action. Use the SF-LLL-A Continuation Sheet for additional information if the space on the form is inadequate. Complete all items that apply for both the initial filing and material change report. Refer to the implementing guidance published by the Office of Management and Budget for additional information.

1. Identify the type of covered Federal action for which lobbying activity is and/or has been secured to influence the outcome of a covered Federal action.
2. Identify the status of the covered Federal action.
3. Identify the appropriate classification of this report. If this is a followup report caused by a material change to the information previously reported, enter the year and quarter in which the change occurred. Enter the date of the last previously submitted report by this reporting entity for this covered Federal action.
4. Enter the full name, address, city, state and zip code of the reporting entity. Include Congressional District, if known. Check the appropriate classification of the reporting entity that designates if it is, or expects to be, a prime or subaward recipient. Identify the tier of the subawardee, e.g., the first subawardee of the prime is the 1st tier. Subawards include but are not limited to subcontracts, subgrants and contract awards under grants.
5. If the organization filing the report in item 4 checks "Subawardee", then enter the full name, address, city, state and zip code of the prime Federal recipient. Include Congressional District, if known.
6. Enter the name of the Federal agency making the award or loan commitment. Include at least one organizational level below agency name, if known. For example, Department of Transportation, United States Coast Guard.
7. Enter the Federal program name or description for the covered Federal action (item 1). If known, enter the full Catalog of Domestic Assistance (CFDA) number for grants, cooperative agreements, loans, and loan commitments.
8. Enter the most appropriate Federal identifying number available for the Federal action identified in item 1 (e.g., Request for Proposal (RFP) number; Invitation for Bid (IFB) number; grant announcement number; the contract, grant, or loan award number; the application/proposal control number assigned by the Federal Agency). Include prefixes, e.g., "RFP-DE-90-001."
9. For a covered Federal action where there has been an award or loan commitment by the Federal agency, enter the Federal amount of the award/loan commitment for the prime entity identified in item 4 or 5.
10.
 - (a) Enter the full name, address, city, state and zip code of the lobbying entity engaged by the reporting entity identified in item 4 to influence the covered Federal action.
 - (b) Enter the full names of the individual(s) performing services, and include full address if different from 10(a). Enter Last Name, First Name, and Middle Initial (MI).
11. Enter the amount of compensation paid or reasonably expected to be paid by the reporting entity (item 4) to the lobbying entity (item 10). Indicate whether the payment has been made (actual) or will be made (planned). Check all boxes that apply. If this is a material change report, enter the cumulative amount of payment made or planned to be made.
12. Check the appropriate box(es). Check all boxes that apply. If payment is made through an in-kind contribution, specify the nature and value of the in-kind payment.
13. Check the appropriate box(es). Check all boxes that apply. If other, specify nature.
14. Provide a specific and detailed description of the services that the lobbyist has performed, or will be expected to perform, and the date(s) of any services rendered. Include all preparatory and related activity, not just time spent in actual contact with Federal officials. Identify the federal official(s) or employee(s) contacted or the officer(s), employee(s), or Member(s) or Congress that were contacted.
15. Check whether or not a SF-LLL-A Continuation Sheet(s) is attached.
16. The certifying official shall sign and date the form, print his/her name, title, and telephone number.

Public reporting burden for this collection of information is estimated to average 30 minutes per response, including time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding the burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to the Office of Management and Budget, Paperwork Reduction (0348-0046), Washington, D.C. 20503.

DISCLOSURE OF LOBBYING ACTIVITIES
CONTINUATION SHEET

Approved by
0348-0046

Reporting Entity: _____ Page _____ of _____

STATEMENT OF COMPLIANCE

Date _____

I, _____ do hereby state:

(Name of signatory party) (Title)
(1) That I pay or supervise the payment of the persons employed by _____ on
(Contractor or subcontractor)
the _____; that during the payroll period commencing on the _____ day of _____,
(Building or work)
_____ and ending the _____ day of _____, all persons employed on said project have been paid the
full weekly wages earned, that no rebates have been or will be made either directly or indirectly to or on behalf of said
_____ from the full weekly wages earned by any person and that no deductions have
(Contractor or subcontractor)
been made either directly or indirectly from the full wages earned by any person, other than permissible deductions as defined in
Regulations, Part 3 (29 CFR Subtitle A), issued by the Secretary of Labor under the Copeland Act, as amended (48 Stat. 948.63
Stat. 108, 72 Stat. 967; 76 Stat. 357; 40 U.S.C. 2760, and described below:

(2) That any payrolls otherwise under this contract required to be submitted for the above period are correct and complete; that
the wage rates for laborers or mechanics contained therein are not less than the applicable wage rates contained in any wage
determination incorporated into the contract; that the classifications set forth therein for each laborers or mechanic conform with
the work he performed.

(3) That any apprentices employed in the above period are duly registered in a bona fide apprenticeship program registered
with a State apprenticeship agency recognized by the Bureau of Apprenticeship and Training, United States Department of Labor,
or if no such recognized agency exists in a State, are registered with the Bureau of Apprenticeship and Training, United States
Department of Labor.

(4) That:

(a) WHERE FRINGE BENEFITS ARE PAID TO APPROVED PLANS, FUNDS, OR PROGRAMS

☐

In addition to the basic hourly wage rates paid to each laborer or mechanic listed in the above—
Referenced payroll, payments of fringe benefits as listed in the contract have been or will be made to
appropriate program for the benefit of such employees, except as noted in Section 4(c) below.

(b) WHERE FRINGE BENEFITS ARE PAID IN CASH

☐

Each Laborer or mechanic listed in the above referenced payroll has been paid as indicated on the payroll, an
amount not less than the sum of the applicable basic hourly wage rate plus the amount of the required fringe
benefits as listed in the contract, except as noted in Section 4(c) below.

(c) EXCEPTIONS

EXCEPTION (CRAFT)	EXPLANATION

REMARK

NAME AND TITLE	SIGNATURE
THE WILFUL FALSIFICATION OF ANY OF THE ABOVE STATEMENTS MAY SUBJECT THE CONTRACTOR OR SUBCONTRACTOR TO CIVIL OR CRIMINAL PROSECUTION. SEE SECTION 1001 OF TITLE 18 AND SECTION 231 OF TITLE 31 OF THE UNITED STATES CODE.	

INSTRUCTIONS FOR PREPARATION OF STATEMENT OF COMPLIANCE

This statement of compliance meets needs resulting from the amendment of the Davis-Bacon Act to include fringe benefits provisions. Under this amended law, the contractor is required to pay fringe benefits as predetermined by the Department of Labor, in addition to payment of the minimum rates. The contractor's obligation to pay fringe benefits may be met by payment of the fringes to the various plans, funds, or programs or by making these payments to the employees as cash in lieu of fringes.

The contractor should show on the face of his payroll all monies paid to the employees whether as basic or as cash in lieu of fringes. The contractor shall represent in the statement of compliance that he is paying to others fringes required by the contract and not paid as cash in lieu of fringes. Detailed instructions follow:

Contractors who pay all required fringe benefits:

A contractor who pays fringe benefits to approved plans, funds, or programs in amounts not less than were determined in the applicable wage decision of the Secretary of Labor shall continue to show on the face of his payroll the basic cash hourly rate and overtime rate paid to his employees, just as he has always done. Such a contractor shall check paragraph 4(a) of the statement to indicate that he is also paying to approved plans, funds, or programs not less than the amount predetermined as fringe benefits for each craft. Any exception shall be noted in Section 4(c).

Contractors who pay no fringe benefits:

A contractor who pays no fringe benefits shall pay to the employee and insert in the straight time hourly rate column of his payroll an amount not less than the predetermined rate for each classification plus the amount of fringe benefits determined for each classification in the applicable wage decision. Inasmuch as it is not necessary to pay time and a half on cash paid in lieu of fringes, the overtime rate shall be not less than the sum of the basic predetermined rate, plus the half time premium on the basic or regular rate plus the required cash in lieu of fringes at the straight time rate. To simplify computation of overtime, it is suggested that the straight time basic rate and cash in lieu of fringes be separately stated in the hourly rate column, thus \$3.25/.40. In addition, the contractor shall check paragraph 4(b) of the statement to indicate that he is paying fringe benefits in cash directly to his employees. Any exceptions shall be noted in Section 4(c).

Use of Section 4(c), Exceptions

Any contractor who is making payment to approved plans, funds, or programs in amounts less than the wage determination requires is obliged to pay the deficiency directly to the employees as cash in lieu of fringes. Any exceptions to Section 4(a) or 4(b), whichever the contractor may check, shall be entered in Section 4(c). Enter in the Exception column the craft, and enter in the Explanation column the hourly amount paid the employees as cash in lieu of fringes, and the hourly amount paid to plans, funds, or programs as fringes.

CHAPTER 104, HRS COMPLIANCE CERTIFICATE

The undersigned bidder does hereby certify to the following:

1. Individuals engaged in the performance of the contract on the job site shall be paid:
 - A. Not less than the wages that the director of labor and industrial relations shall have determined to be prevailing for corresponding classes of laborers and mechanics employed on public works projects; and
 - B. Overtime compensation at one and one-half times the basic hourly rate plus fringe benefits for hours worked on Saturday, Sunday, or a legal holiday of the State or in excess of eight hours on any other day.
2. All applicable laws of the federal and state governments relating to workers' compensation, unemployment compensation, payment of wages, and safety shall be fully complied with.

DATED at Honolulu, Hawaii, this _____ day of _____, 20__.

«CONTRACTOR»

Name of Corporation, Partnership, or Individual

Signature and Title of Signer

Notary Seal
NOTARY ACKNOWLEDGEMENT

Subscribed and sworn before me this _____ day of _____
Notary signature _____
Notary public, State of _____
My Commission Expires: _____

Notary Seal
NOTARY CERTIFICATION

Doc. Date: _____ #Pages: _____
Notary Name: _____ Circuit
Doc. Description: _____

Notary signature _____
Date _____