FED. ROAD DIST. NO.	STATE	FEDERAL AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BR-019-2(077)	2024	3	280

GENERAL NOTES:

1. The scope of work for this project includes replacing steel truss members, bearings, gusset plates, etc., that have corrosion and section loss; fixing spalls and delamination in the concrete deck, abutments, bridge railings and column pedestals; cleaning and painting the steel members following the repairs; addressing scour deficiencies for the bridge foundations; removal and disposal of bridge sections and parts; cold planing and paving with asphalt and hybrid polymer concrete; management of contaminated materials; installation of pavement markings; installation of BMP measures for erosion control and hazardous materials; and traffic control.

2. Subsection 105.16(A) - Subcontract Requirements requires the Contractor to perform work amounting to not less than 30 percent of the total contract cost less deductible items.

3. The Contractor's attention is directed to the following Sections of the Standard Specifications and the Special Provisions 104.09 - Maintenance of Traffic; Subsection 105.09 - Coordination Between the Contractors; Subsection 107.06 - Contractor Duty Regarding Public Convenience; Subsection 107.12 - Protection of Persons and Property; and Section 645 - Work Zone Traffic Control.

4. At the end of each day's work, the Contractor shall remove all equipment and other obstructions to permit free and safe passage of public traffic.

5. The existence and location of underground utilities, manholes, monuments and structures as shown on the plans are from the latest available data but the accuracy is not guaranteed. The encountering of other obstacles during the course of work is possible. The Contractor shall tone for the exact locations and depths of all underground facilities, either shown on or omitted from the plans. Toning shall be considered incidental to the various contract items and will not be paid for separately. The Contractor shall be held liable for any damages incurred to the existing facilities and/or improvements as a result of his operations.

6. The Contractor shall notify Hawaii Island Hele-On Bus two (2) weeks prior to lane closures, informing them of the location and dates of lane closures and name of affected roadway.

7. The Contractor shall notify the Engineer in writing, two (2) weeks prior to starting construction operations.

8. The Contractor shall indemnify and be solely responsible for the protection of adjacent properties, utilities, and existing structures from damages due to construction. Repairing any damage shall be at the Contractor's own expense, to the satisfaction of the Engineer.

9. The existing drainage system shall be kept functional at all times during construction. Furnish materials, equipment, labor, tools and incidentals necessary to maintain flow. This work shall be considered incidental to the various contract items.

10. No material or equipment shall be stockpiled or otherwise stored within highway right-of-way except at locations shown on the plans or designated in writing and approved by the Engineer.

11. The Contractor shall restore any damaged benchmarks or survey monuments. This work shall be considered incidental to the various contract items.

12. Benchmark for this topo is based on Triangulation Station "Honohina Reset". Azimuths and coordinates are referred to the Hawaii State Plane Coordinate System Zone 1, NAD83(1993). To convert to local Triangulation Station "Honohina Reset" azimuths, add (0° 07' 00.6") to the State Plane azimuths. Elevations are referenced to BM Box Cut found at the South end of Opea Bridge as noted on sheet 5468.4 of Hawaii Belt Road, Seismic Wave Damage Rehabilitation Project No. S.D.R. 3(13) Dated June 10, 1953. Elevation at Benchmark is 260.44 Mean Sea Level.

13. Smooth riding connections shall be constructed at all limits of project, including the beginning and end of project, connecting approaches, side streets, walkways and driveways as shown on the plans and/or as directed by the Engineer. This work shall be considered incidental to asphalt concrete and will not be paid for separately.

14. The Contractor shall clean and remove any accumulation of aggregates along the roadside within 10 feet of the edge of pavement. This work shall be considered incidental to bulk of work or the various contract items and will not be paid for separately.

15. The Contractor shall provide and maintain for access to and from all existing driveways, sidewalks and ADA access routes, and side streets and cross streets at all times. This work shall be considered incidental to the various contract items and will not be paid for separately.

16. Traffic control plans shown in the Contract Documents are minimum requirements and do not constitute a complete traffic control plan. The Contractor shall provide any traffic control plan (not shown in the plans) that is needed to accomplish the work based on Contractor's means and methods considering site conditions and construction sequence in accordance with the Contract Documents including applicable Manual (on) Uniform Traffic Control Devices (MUTCD) requirements. All lane closures or traffic pattern changes (detours) not shown on the plan shall be submitted to the Engineer for approval in accordance with Specifications Section 645 - Work Zone Traffic Control. For restrictions on lane closures, detours, construction work during peak hours, and other requirements regarding maintaining vehicular and pedestrian traffic, see Section 645 - Work Zone Traffic Control. All traffic control related costs shall be included in the lump sum traffic control Pay Item 645.1000 - Traffic Control.

17. Submit requests for detours, and lane closures in accordance with Hawaii Standard Specification Subsection 645.03(F). Refer to minimum timeframes required for implementation. Approval may be denied if submittal timeframe is not set.

18. Contractor required to coordinate with other projects in the vicinity and obtain any approvals/permit needed to do the work.

19. All public notices and advertisements shall be incidental to lump sum traffic control Pay Item 645.1000 - Traffic Control, and shall not be paid for separately, unless otherwise directed by Engineer.

20. If the traffic control plan or any traffic control device is not installed per plan, specification, or is deemed unsafe, the Engineer reserves the right to shut down the work at no additional cost and time or withhold payment.

21. The Contractor shall verify the presence of existing utilities which may conflict with activities and shall coordinate with the utility company for temporary relocation, as necessary. All costs associated with the temporary relocation shall be borne by the Contractor and shall be incidental to the various pay items.

22. The Contractor shall comply with utility coordination requirements per Standard Specification Section 104.11. As part of coordination requirements, the Contractor shall provide a copy to the Engineer in all correspondences with utilities.

23. All materials shall be new and free of defects, such as rust, damage, or corrosion. The Engineer will determine acceptability. No payment will be made for material that is not accepted by the Engineer.

24. The Contractor shall allow access to all materials that will be used in the project for inspection and/or testing (this includes but is not limited to access to Contractor or subcontractor's base yards, manufacturer yard, production plant, separate storage areas). The Engineer reserves the right to reject any material for which access or inspection is not allowed.

25. Unauthorized occupancy of a lane, shoulder, or location encroached upon or occupied beyond the time periods authorized in the contract or by the Engineer may be subject to rental fees in accordance with Special Provisions 108.09.

26. All material generated by the project and taken off-site shall be considered solid waste. The Contractor shall dispose of all removed material at an approved Department of Health waste management facility. Provide a copy of all the disposal receipts from the facility permitted by the Department of Health to receive solid waste to the Engineer by the last day of the month. Provide documentation from any intermediary facility where solid waste is handled or processed, haul tags, or any documentation as requested by the Engineer. If the Contractor elects to reclassify material as inert fill, DOH HEER testing guidance shall be followed. No material generated from this project shall be classified as inert fill material for reuse without testing, obtaining required approvals/permits, providing disposal locations/quantities, and obtaining prior written approval from the Engineer. Failure to comply with these requirements may result in fines/liquidated damages in accordance with Special Provisions Section 209 and HDOT's Enforcement Response Plan.

27. All work specified in the Contract Documents but not itemized in the proposal including all that is needed to complete the work shall be considered incidental to the various contract items and shall not be paid for separately.

ORIGINAL PLAN	SURVEY PLOTTED BY	DATE
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	TRACED BY	
NOTE BOOK	DESIGNED BY	
	QUANTITIES BY	
No.	CHECKED BY	

RANDALL M. URASAKI
LICENSED PROFESSIONAL ENGINEER
No. 7269-C
HAWAII, U.S.A.

THIS WORK WAS PREPARED BY ME OR UNDER MY SUPERVISION.

SIGNATURE 04/30/26 EXPIRATION DATE OF THE LICENSE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

GENERAL NOTES

HAWAII BELT ROAD
Nanue Stream Bridge Rehabilitation
Federal Aid Project No. BR-019-2(077)

Scale: None Date: Oct. 2024

SHEET No. N-2 OF 7 SHEETS

FED. ROAD DIST. NO.	STATE	FEDERAL AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BR-019-2(077)	2024	4	280

PUBLIC HEALTH, SAFETY, AND CONVENIENCE NOTES:

1. *The Contractor shall observe and comply with all Federal, State, and Local laws required for the protection of public health and safety and environmental quality.*

2. *The Contractor, at his own expense, shall keep the project and its surrounding areas free from dust nuisance. The work shall be in conformance with the air pollution standards and regulations of the State Department of Health. The County may require supplementary measures as necessary.*

3. *The Contractor is to comply with the directions of the State of Hawaii Occupation Safety and Health Law (DOSH).*

HISTORICAL PRESERVATION NOTES:

1. *In the unlikely event that subsurface historic resources, including human skeletal remains, structural remains, cultural deposits, artifacts, sand deposits, or sink holes are identified during the demolition and/or construction work, cease work in the immediate vicinity of the find, protect the find from additional disturbance, and contact the State Historic Preservation Division, at (808) 933-7651, which will assess the significance of the find and recommend the appropriate mitigation measures, if necessary. In addition, if human remains are found, the Contractor shall immediately notify the County of Hawaii Police Department.*

HAWAII-ONE-CALL NOTES:

1. *The Contractor shall contact Hawaii One Call Center to have respective utility companies and agencies mark where their underground utilities are located. The Contractor shall comply with all requirements of Hawaii One Call Law. The Contractor shall be liable for any damages if Hawaii One Call requirements are not strictly adhered to. In accordance with Hawaii State Law Section 269E-7, the Hawaii One Call Center (HOCC) shall provide an inquiry identification number for each location request provided by the Contractor. The inquiry identification number and utility marks shall remain valid for not more than twenty-eight (28) calendar days from the date of issuance and after that date shall require the Contractor to submit a new request for HOCC revalidation. The Contractor shall provide all inquiry identification numbers for each location request to the Engineer.*

STAGING AREA NOTES:

1. *The Contractor shall be responsible for securing staging area(s) outside of the HDOT right-of-way. Securing a staging area includes obtaining property owner's consent and all necessary permits to utilize the site.*

2. *Note that property TMK (3) 3-2-001:008 has been cleared for Section 106 and HRS 6E-8.*

3. *Payment for securing staging area(s) is considered incidental to the various contract pay items.*

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GENERAL NOTES

HAWAII BELT ROAD
Nanue Stream Bridge Rehabilitation
Federal Aid Project No. BR-019-2(077)

Scale: None Date: Oct. 2024

SHEET No. N-3 OF 7 SHEETS

FED. ROAD DIST. NO.	STATE	FEDERAL AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BR-019-2(077)	2024	5	280

GRADING NOTES:

1. All grading work shall be done in accordance with Chapter 14, Articles 13, 14, 15 and 16, as related to Grading, Soil Erosion and Sediment Control, of the Revised Ordinances of Honolulu, 1990, as Amended.

2. No Contractor shall perform any grading operation so as to cause falling rocks, soil or debris in any form to fall, slide or flow onto adjoining properties, streets or natural watercourses. Should such violations occur, the costs incurred for any remedial action shall be payable by the Contractor.

3. The Contractor, at his own expense, shall keep the project area and surrounding area free from dust nuisance. The work shall be in conformance with the Air Pollution Control Standards contained in The Hawaii Administrative Rules, Title 11, Chapter 60.1, "Air Pollution Control".

4. The underground pipes, cables or ductlines known to exist by the Engineer from his search of records are indicated on the plans. The Contractor shall verify the locations and depths of the facilities and exercise proper care in excavating in the area. Wherever connections of new utilities are shown on the plans, the Contractor shall expose the existing lines at the proposed connections to verify their locations and depths prior to excavation for the new lines.

5. Adequate provisions shall be made to prevent surface waters from damaging the cut face of an excavation or the sloped surfaces of a fill. Furthermore, adequate provisions shall be made to prevent sediment-laden runoff from leaving the site.

6. All slopes and exposed areas shall be sodded or planted as soon as final grades have been established. Planting shall not be delayed until all grading work has been completed. Grading to final grade shall be continuous, and any area within which work has been interrupted or delayed shall be planted.

7. Fills on slopes steeper than 5:1 shall be keyed.

8. The Engineer shall be informed of the location of the borrow/disposal site for the project when the application for a grading permit is made. The borrow/disposal site must also fulfill the requirements of the grading ordinance.

9. No grading work shall be done on Saturdays, Sundays and holidays at any time without prior notice to the District Engineer, provided such grading work is also in conformance with The Community Noise Control Standard Contained in The Hawaii Administrative Rules, Title 11 Chapter 46, "Community Noise Control".

10. The limits of the area to be graded shall be flagged before the commencement of the grading work.

11. All grading operations shall be performed in conformance with the applicable provisions of the water pollution control and water quality standards contained in Hawaii Administrative Rules, Title 11 Chapter 55, "Water Pollution Control" and Title 11 Chapter 54, "Water Quality Standards" and if applicable, the NPDES permit for the project.

12. Where applicable and feasible the measures to control erosion and other pollutants shall be in place before any earth moving phase of the grading is initiated.

13. Temporary erosion controls shall not be removed before permanent erosion controls are in-place and established.

14. Temporary erosion control procedures shall be submitted for approval prior to application for grading permit.

15. If the grading work involves contaminated soil, then all grading work shall be done in conformance with applicable State and Federal requirements.

16. Non-compliance to any of the above requirements shall mean immediate suspension of all work, and remedial work shall commence immediately. All remedial work shall be billed to the Contractor. All remedial work shall be at no cost to the State. Furthermore, violators shall be subjected to administrative, civil and/or criminal penalties.

17. Prior to placement of any fill, the existing ground shall be scarified to a depth of six inches and compacted to a minimum of 90 percent compaction as determined by AASHTO T-180.

18. After clearing and grubbing, additional roots and other vegetation found in the upper 6 to 8 inches shall be removed.

19. Construction observation and field density testing shall be performed by the State. Where test and/or observations indicate that the density of uniformity of any portion of the fill is inadequate, that portion shall be removed and reworked until the required density or uniformity has been satisfactorily obtained.

ORIGINAL PLAN
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STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

GENERAL NOTES
GRADING NOTES

HAWAII BELT ROAD
Nanue Stream Bridge Rehabilitation
Federal Aid Project No. BR-019-2(077)

Scale: None Date: Oct. 2024

SHEET No. N-4 OF 7 SHEETS

FED. ROAD DIST. NO.	STATE	FEDERAL AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BR-019-2(077)	2024	6	280

NOTES FOR PROTECTION OF ENDANGERED SPECIES:

1. Inform project personnel and construction staff of the potential presence of threatened and endangered species on the project site. Provide materials to assist in species identification and appropriate actions if a species enters the work area.

2. HAWAIIAN SEABIRDS
No night time construction will be permitted during the seabird fledging period (September 15th through December 15th).

   All outdoor construction flood lights shall be fully shielded with automatic motion sensor switches and controls or turn off lights when human activity is not occuring in the lighted area.

3. HAWAIIAN HOARY BAT (Ope'ape'a)
No disturbing, clearing, grubbing, or trimming of woody plants greater than 15' tall shall be allowed during the Hawaiian Hoary Bat birthing and pup-rearing season (June 1st through September 15th).

   The Contractor shall not use barbed wire fencing.

4. HAWAIIAN GOOSE (Nene)
The Contractor's personnel shall be trained to identify Nene and instructed to not approach, disturb, or feed geese.

   If geese are observed loafing or foraging within the project area during the breeding season (September 1st through April 30th), a biologist familiar with the nesting behavior of geese shall survey for nests in and around the project area prior to the resumption of any work. Surveys shall be repeated after any subsequent delay of work of 3 or more days (during which the birds may attempt to nest).

   If a goose nest is discovered within a radius of 150 feet of the proposed work, cease all work immediately and contact the USFWS (808) 792-9400 for further guidance.

   In areas where geese are known to be present, post and implement reduced speed limits and inform project personnel and contractors about the presence of endangered species on-site.

5. The Hawaiian Short-Eared Owl (pueo)
Before any potential vegetative alteration, especially ground based disturbance, line transect surveys shall be conducted during crepuscular hours through the project area. If a pueo nest is discovered, a minimum buffer of 100 meters from the nest should be established until chicks are capable of flight.

6. The Hawaiian Hawk ('io)
Prior to vegetation cleaning, pre-construction surveys shall be conducted by a qualified biologist to ensure no Hawaiian Hawk nests are present. The survey shall be conducted at least 10 days prior to the start of construction. If an 'io nest is detected, a buffer zone of 100 meters shall be established around it where no construction shall occur until the chick or chicks have fledged, or the nest is abandoned.

7. WATERBIRDS (Ae'o or Hawaiian Stilt, 'Alae Ke'oke'o or Hawaiian coot)
In areas where waterbirds are known to be present, post and implement reduced speed limits and inform project personnel and contractors about the presence of endangered species on-site.

   In areas where vegetated streambanks would be disturbed, waterbird nest searches shall be conducted by a qualified biologist before any work is conducted, within 3 days of project initiation and after any subsequent delay of work of 3 or more days (during which the birds may attempt to nest).

   If a nest or active brood is found:
   - Contact the USFWS (808) 792-9400 and Hawaiian Island Branch DOFAW office at (808) 974-4221 within 24 hours for further guidance.
   - Establish and maintain a 100-foot buffer around all active nests and/or broods until the chicks have fledged. Do not conduct potentially disruptive activities or habitat alteration within this buffer.
   - A biological monitor that is familiar with the species' biology shall be present on the project site during all construction or earth moving activities until the chicks fledge to ensure that Hawaiian waterbirds and nests are not adversely impacted.

8. SEA TURTLES (Honu)
To avoid and minimize project impacts to sea turtles and their nests the following measures shall be incorporated into the project:
   - Do not remove native dune vegetation.
   - Applicable best management practices regarding Work in Aquatic Environments will be required.
   - A biologist familiar with sea turtles shall conduct a visual survey of the project site to ensure no basking sea turtles are present.
   - If a basking sea turtle is found within the project area:
     - Cease all mechanical or construction activities within 100 feet until the animal voluntarily leaves the area.
     - Cease all activities between the basking turtle and the ocean.
   - Remove any project-related debris, trash, or equipment from the beach or dune if not actively being used.
   - Do not stockpile project-related materials in the intertidal zone, reef flats, sandy beach and adjacent vegetated areas, or stream channels.

9. Turbidity and siltation from project-related work should be minimized and contained within the project area by silt containment devices and curtailing work during flooding or adverse tidal and weather conditions. BMPs should be maintained for the life of the construction period until turbidity and siltation within the project area is stabilized. All project construction-related debris and sediment containment devices should be removed and disposed of at an approved site.

10. No project construction-related materials or equipment (dredges, vessels, backhoes, silt curtains, etc.) shall be placed in an aquatic environment. Project related activities should not result in any debris disposal, non-native species introductions, or attraction of non-native pests to the affected or adjacent aquatic or terrestrial habitats.

11. Project construction-related materials (fill, revetment rock, pipe, etc.) should not be stockpiled in, or in close proximity to, aquatic habitats and should be protected from erosion (e.g., with filter fabric, etc.), to prevent materials from being carried into waters by wind, rain, or high surf.

12. Fueling of project-related vehicles and equipment should take place away from the aquatic environment and a contingency plan to control petroleum products accidentally spilled during the project should be developed. The plan should be retained on site with the person responsible for compliance with the plan. Absorbent pads and containment booms should be stored on-site to facilitate the clean-up of accidental petroleum releases.

13. All deliberately exposed soil or under-layer materials used in the project near water should be protected from erosion and stabilized as soon as possible with geotextile, filter fabric or native or non-invasive vegetation matting, hydro-seeding, etc.

14. A litter-control plan shall be developed and implemented to prevent attraction and introduction of non-native species.

15. Invasive species controls shall be maintained to ensure that all materials transported from off-site are free of such species.

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SIGNATURE ____ 04/30/26 EXPIRATION DATE OF THE LICENSE

STATE OF HAWAII
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GENERAL NOTES

HAWAII BELT ROAD
Nanue Stream Bridge Rehabilitation
Federal Aid Project No. BR-019-2(077)

Scale: None Date: Oct. 2024

SHEET No. N-5 OF 7 SHEETS

FED. ROAD DIST. NO.	STATE	FEDERAL AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BR-019-2(077)	2024	7	280

NOTES FOR PROTECTION OF ENDANGERED SPECIES Cont.:

16. ESA-Listed Marine Species (Sea Turtles and Hawaiian Monk Seals)
    1. Constant vigilance shall be kept for the presence of ESA-listed marine species (sea turtles and Hawaiian monk seals) during construction.
    2. The Contractor shall designate a competent observer to search/monitor work sites and the areas adjacent to the authorized work area for ESA-listed marine species.
    3. Work shall be postponed or halted when ESA-listed marine species are within 50 yards.
    4. A pollution and erosion control plan for the project site and adjacent areas must be prepared and carried out. As a minimum, this plan shall include:
        a. Proper installation and maintenance of silt fences/curtains, sausages, equipment diapers, or drip pans.
        b. A contingency plan to control and clean spilled petroleum products and other toxic materials.
        c. Appropriate materials to contain and clean potential spills will be stored at the work site, and be readily available.
        d. All project-related materials and equipment placed in the water will be free of pollutants.
        e. Daily pre-work inspections of heavy equipment for cleanliness and leaks, with all heavy equipment operations postponed or halted until leaks are repaired and equipment is cleaned.
        f. Fueling of project-related vehicles and equipment will take place at least 50 feet away from the water and within a containment area, preferably over an impervious surface.
    5. BMPs shall be implemented in accordance with An Integrated Storm Water Management Approach and a Summary of Clear Water Diversion and Isolation Best Management Practices for Use in the State of Hawaii, by the Federal Highway Administration and Hawaii Department of Transportation Practitioners Guide (2016) or the Construction Best Management Practices Field Manual by the State of Hawaii Department of Transportation (2008).
        a. All objects will be lowered to the bottom in a controlled manner. This can include the use of buoyancy controls such as lift bags, or the use of cranes, winches, or other equipment that affect positive control over the rate of descent.
        b. Special attention shall be given to ensure that no ESA-listed marine species are within 50 yards of maintenance dredging, in-water excavation and movement of large armor stones, and benthic core sampling, and that those operations will immediately shut-down should any ESA-listed species enter within that range.
        c. Full-depth silt curtains shall be installed around all work sites with the potential to disturb and mobilize sediments. This will contain mobilized sediments in the marine environment and reduce the potential for elevated turbidity.

17. Alani, Nanu and Microlepia strigose var. mauiensis
    To avoid and minimize project impacts to flowering plants and ferns and allies, the table below shall be followed:

Action		Buffer Distance (feet - (meters)) - Keep Project Activity This Far Away from Listed Plant	
		Grasses/Herbs/Shrubs and Terrestrial Orchids	Trees and Arboreal Orchids
Walking, hiking, surveys		3 ft (1 m)	3 ft (1 m)
Cutting and Removing Vegetation By Hand or Hand Tools (e.g., weeding)		3 ft (1 m)	3 ft (1 m)
Mechanical Removal of Individual Plants or Woody Vegetation (e.g., chainsaw, weed eater)		3 ft up to height of removed vegetation (whichever greater)	3 ft up to height of removed vegetation (whichever greater)
Removal of Vegetation with Heavy Equipment (e.g., bulldozer, tractor, "bush hog")		2x width equipment + height of vegetation	820 ft (250 m)
Use of Approved Herbicides (following label)	Ground-based Spray Application; hand application (no wand applicator; spot treatment)	10 ft (3 m)	Crown diameter
	Ground-based Spray Application; manual pump with wand, backpack	50 ft (15 m)	Crown diameter
	Ground-based Spray Application; vehicle-mounted tank sprayer	50 ft (15 m)	Crown diameter
	Aerial Spray (ball applicator)	250 ft (76 m)	250 ft (76 m)
	Aerial Application - herbicide ballistic technology (individual plant treatment)	100 ft (30 m)	Crown diameter
	Aerial Spray (boom)	Further consultation required	Further consultation required
Use of Insecticides (pollinators, seed dispersers)		Further consultation required	Further consultation required
Ground/Soil Disturbance/Outplanting/Fencing (Hand Tools, e.g. shovel, ʻō ʻō; Small mechanized tools, e.g., auger)		20 ft (6 m)	2x crown diameter
Ground/Soil Disturbance (Heavy Equipment)		328 ft (100 m)	820 ft (250 m)
Surface Hardening/Soil compaction	Trails (e.g., human ungulates)	20 ft (6 m)	2x crown diameter
	Roads/Utility Corridors, Buildings/Structures	328 ft (100 m)	820 ft (250 m)
Prescribed Burns		Further consultation required	Further consultation required
Farming/Ranching/Silviculture		820 ft (250 m)	820 ft (250 m)

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GENERAL NOTES

HAWAII BELT ROAD
Nanue Stream Bridge Rehabilitation
Federal Aid Project No. BR-019-2(077)

Scale: None — Date: Oct. 2024

SHEET No. N-6 OF 7 SHEETS

FED. ROAD DIST. NO.	STATE	FEDERAL AID PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	BR-019-2(077)	2024	8	280

ABBREVIATIONS:

℄	BASELINE
BC	BOTTOM CURB
BMP	BEST MANAGEMENT PRACTICES
CLR	CLEARANCE
Ch	CHORD
CONC	CONCRETE
D	DRAIN LINE
DI	DRAIN INLET
DIA.	DIAMETER
E	ELECTRICAL
ES	EDGE OF SHOULDER
ep	EXISTING EDGE OF PAVEMENT
EP	EDGE OF PAVEMENT
ELEV	ELEVATION
EMB	EMBANKMENT
EXC	EXCAVATION
EXIST.	EXISTING
FH	FIRE HYDRANT
GRP	GROUTED RUBBLE PAVING
GW	GUY WIRE
HMA	HOT MIX ASPHALT
INV.	INVERT
Lc	LENGTH OF CURVE
LF	LINEAR FEET
LT.	LEFT
MB	METER BOX
MIN.	MINIMUM
M.L.	MATCHLINE
N	NORTH
NTS	NOT TO SCALE
O/H.	OVERHEAD ELECTRICAL
o/s	OFFSET
PC	POINT OF CURVATURE
PCCP	PORTLAND CEMENT CONCRETE PAVEMENT
PI	POINT OF INTERSECTION OF TANGENTS
PRC	POINT OF REVERSE CURVE
PT	POINT OF TANGENCY
PVMT	PAVEMENT
R	RADIUS
RD	ROAD
RT.	RIGHT
R/W	RIGHT-OF-WAY
S.E.	SUPERELEVATION
SF	SQUARE FEET
SHT	SHEET
ST	STREET
STA.	STATION
STD	STANDARD
T	TANGENT
TC	TOP CURB
TYP.	TYPICAL
U/G	UNDER GROUND
UP	UTILITY POLE
VAR	VARIES
W	WATER
WMH	WATER MANHOLE
WV	WATER VALVE

LEGEND:

EXISTING

	DI
D5	5" DRAIN LINE
ELEC.	ELEC. BOX
	ELEC MH
	ELEC. BOX
	ELEC TRANSFORMER
	E.O.
	FH
	G.P.
	GUARD RAIL
	G.W.
	MH
O/H	OVERHEAD LINE
	SMH
	SEWER VALVE
	SIGN
	S.L.
	STREET MONUMENT
	TEL BOX
	TEL. MH
TEL.	TELEPHONE LINE
	TREE
	TSL
	TSLB
	U.P/S.L.
	U.P./CONDUIT
	UTILITY BOX
W6	6" WATERLINE
	WM
	WMH
	WV

ORIGINAL PLAN
NOTE BOOK No.
SURVEY PLOTTED BY DATE
DRAWN BY
TRACED BY
DESIGNED BY
QUANTITIES BY
CHECKED BY

RANDALL M. URASAKI
LICENSED PROFESSIONAL ENGINEER
No. 7269-C
HAWAII, U.S.A.

THIS WORK WAS PREPARED BY ME OR UNDER MY SUPERVISION.

SIGNATURE 04/30/26 EXPIRATION DATE OF THE LICENSE

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

LEGEND AND ABBREVIATIONS

HAWAII BELT ROAD
Nanue Stream Bridge Rehabilitation
Federal Aid Project No. BR-019-2(077)

Scale: None Date: Oct. 2024

SHEET No. N-7 OF 7 SHEETS