

FED. ROAD DIST. NO.	STATE	PROJ. NO.	FISCAL YEAR	SHEET NO.	TOTAL SHEETS
HAWAII	HAW.	HID-01-98M	1998	3	4

GENERAL NOTES

GENERAL:

1. This project includes repairing spalled and cracked concrete.
2. All reinforcing steel to be ASTM A 615 Grade 40.
3. All welding shall be done in accordance with the current edition of the Reinforcing Steel Welding Code AWS D1.4.
4. Maintenance & control of traffic--See Special Provisions sub-section 104.04.
5. The scope of work for this project consists of repairing damaged or defective portions of the top deck with repair concrete. (See Subsection 676)
6. The Contractor is reminded of the requirements of Subsection 108.01--Subletting of Contract, which requires him to perform work amounting to not less than 50 percent of the total contract cost less deductible items. Non-compliance with this Subsection may be grounds for rejection of bid.
7. The Contractor's attention is directed to the following Sections of the Special Provisions: Subsection 107.13--Public Convenience and Safety; Subsection 107.21--Contractor's Responsibility For Utility Property And Services; and Section 645--Traffic Control.
8. 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.
9. 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 be held liable for any damages incurred to the existing facilities and/or improvements as a result of his operations.

10. The Contractor shall notify in writing, the Oahu Transit Services, Inc. Roads Supervision Office, 811 Middle Street, Honolulu, Hawaii 96819 (phone# 848-4571) seven (7) days prior to any repairing operations.
11. The Contractor shall notify the Engineer in writing, two (2) weeks prior to starting repairing operations.

REPAIR NOTES:

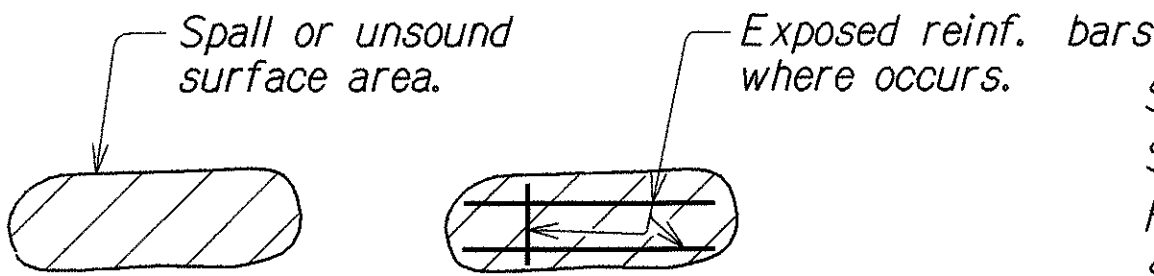
1. All deteriorated, damaged, cracked, spalled, honeycombed concrete or concrete over rusted reinforcing bars shall be removed as shown and repaired.
Face of existing concrete
Hatched area denotes approximate damaged area from which loose or unsound concrete has been partially removed.
Limits of concrete removal or concrete patch (see detail this sheet).
2. Provide minimum 1" concrete cover over reinforcement.
3. Reinforcing bars that have rusted more than 25% of their original cross sectional area shall be strengthened as shown on "Reinforcing Bar Repair Splice Detail", this sheet.
4. The Engineer shall determine all areas to be repaired and the limits of repair at each area.

INCIDENTAL ITEMS:

The following items shall be considered incidental to the various pay items or repairs and will not be paid for separately:

1. Cleaning of all exposed, corroded reinforcing steel to sound metal.
2. Reinforcing bars of repair splice for strengthening corroded bars.
3. Cutting, pushing down existing reinforcing bars or doweling reinforcing bars into the existing concrete deck.
4. Replacing pavement markers and striping damaged or removed during the course of construction.

SYMBOLS AND ABBREVIATIONS:

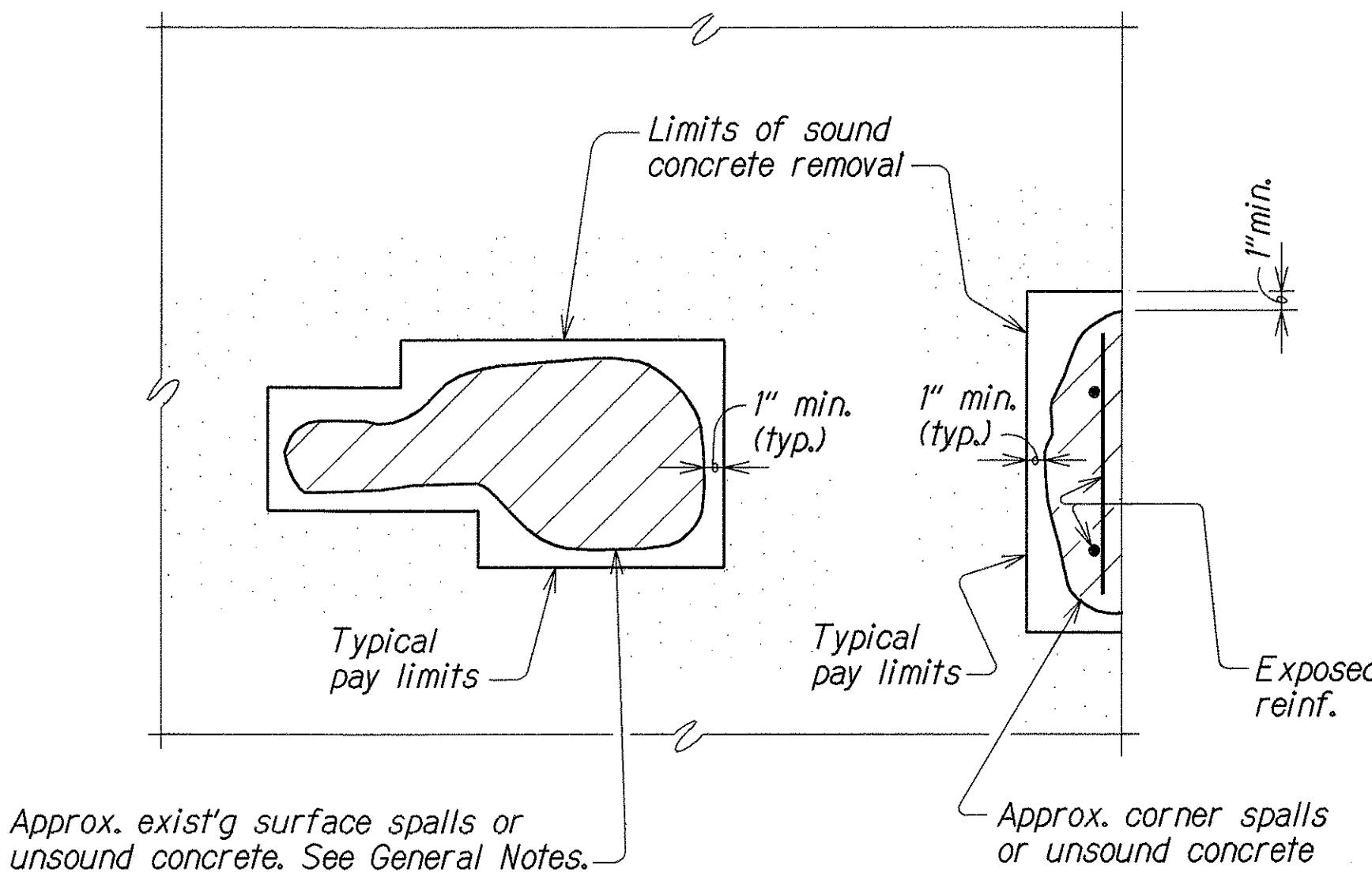


S.S.: Surface spall (Concrete)
S.C.: Surface crack (Concrete)
H.C.: Hairline crack
S.F. or sq. ft.: Square feet
L.F.: Linear feet

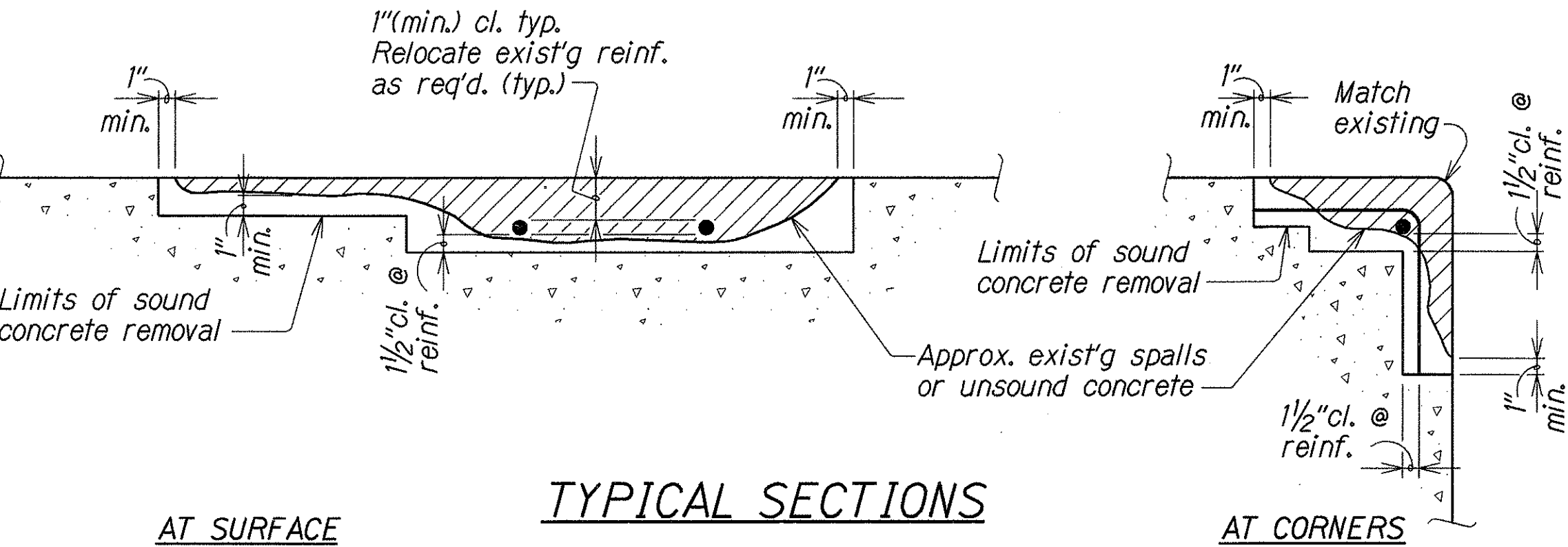
ESTIMATED QUANTITIES

ITEM NO.	DESCRIPTION	UNITS	QUANTITY
676.0200	Spall Repair	SF	720*

* Includes estimated overrun



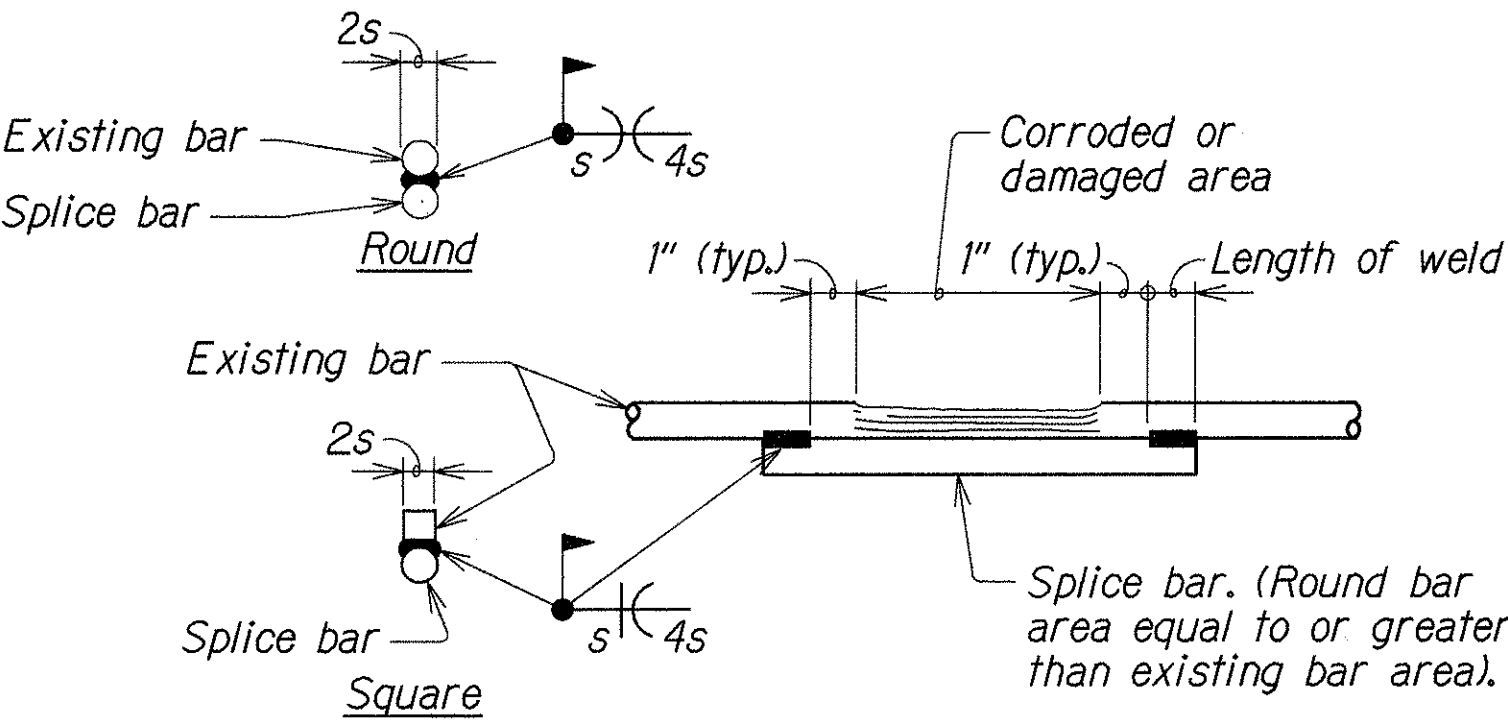
PLAN OR ELEVATION



TYPICAL SECTIONS

TYPICAL CONCRETE REPAIRS

Not to Scale



REINFORCING BAR
REPAIR SPLICE DETAIL

Not to Scale

STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
HIGHWAYS DIVISION

WAIAWA INTERCHANGE BRIDGE NO. 1

TYPICAL CONCRETE REPAIRS

GENERAL NOTES AND ESTIMATED QUANTITIES

INTERSTATE ROUTE H-1
WAIAWA BRIDGE NO. 1 REPAIR SPALLS ON DECK
Project No. HID-01-98M

Scale: As Noted Date: April, 1998

SHEET No. 01 OF 2 SHEETS