



HAWAIIAN HOME LANDS
HAWAIIAN HOMES COMMISSION
DEPARTMENT OF HAWAIIAN HOME LANDS

Papakolea Sewer System Update

LAND DEVELOPMENT DIVISION
Item E-1 Workshop
Monday, July 15, 2019

Papakolea, Kewalo and Kalawahine



PAPAKOLEA

An aerial photograph showing a dense residential area with many small houses and trees. A yellow dashed line outlines a specific region within the image. The area is surrounded by green hills and a body of water on the left. The text 'PAPAKOLEA' is overlaid on the left side of the image.

KALAWAHINE

KEWALO

Papakolea Sewer Improvements

Purpose

- Repair and/or replace damaged and undersized pipes
- To upgrade sewer improvements and access which comply with City and County Standards



Before



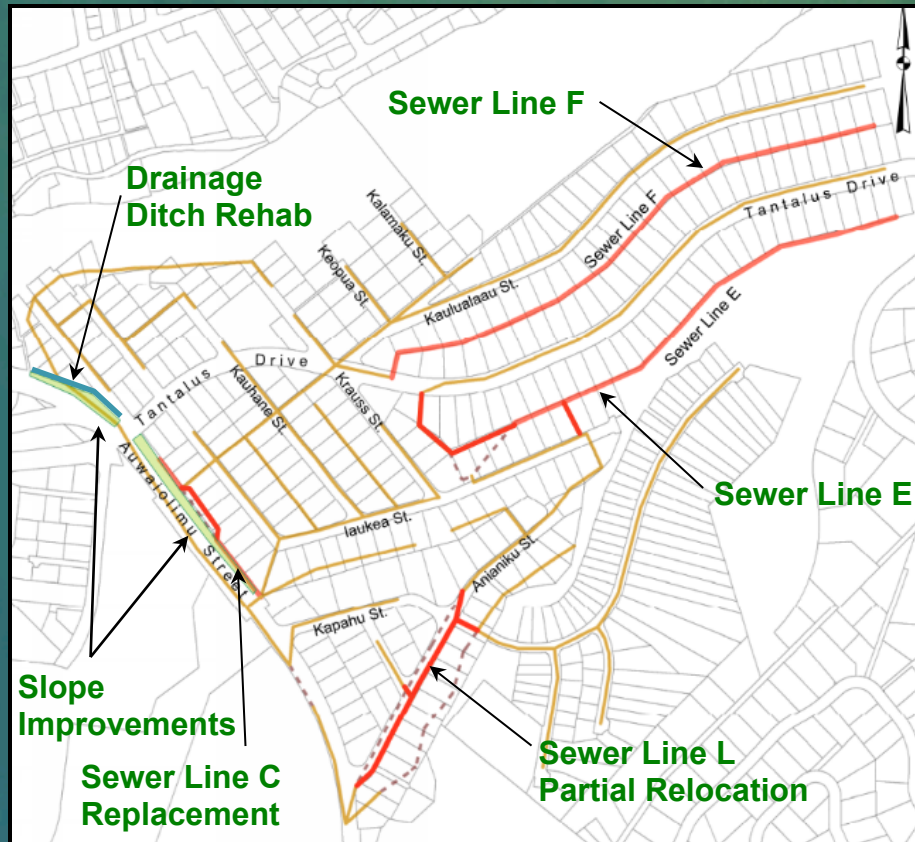
During



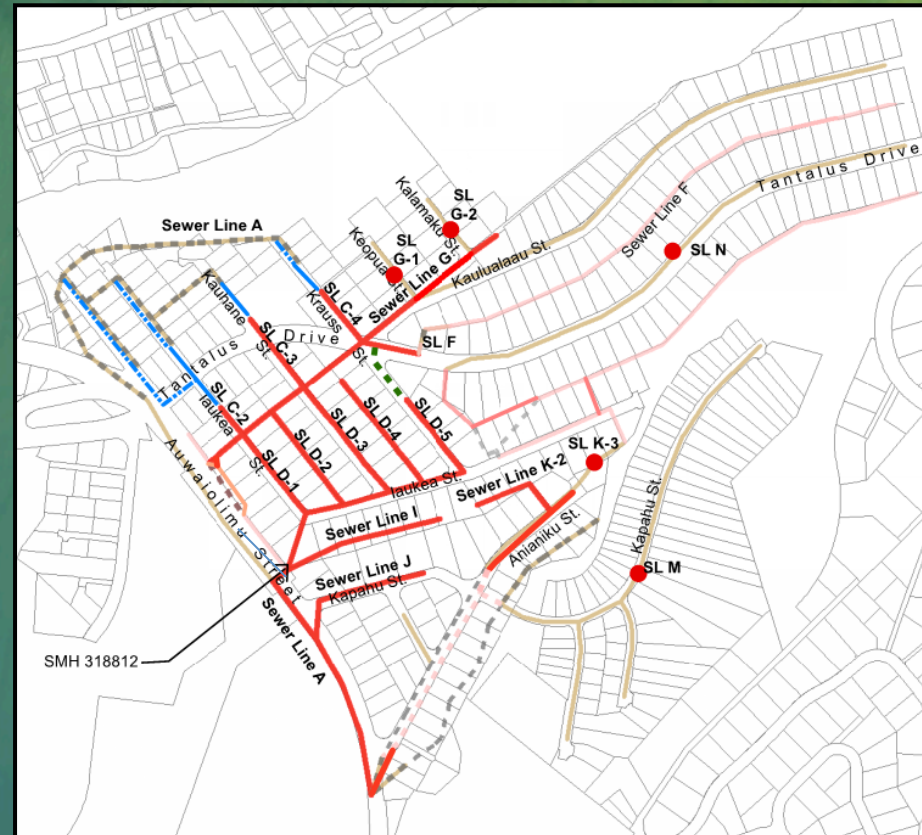
After

Papakolea Sewer Improvements

Phase 1 Phase 2

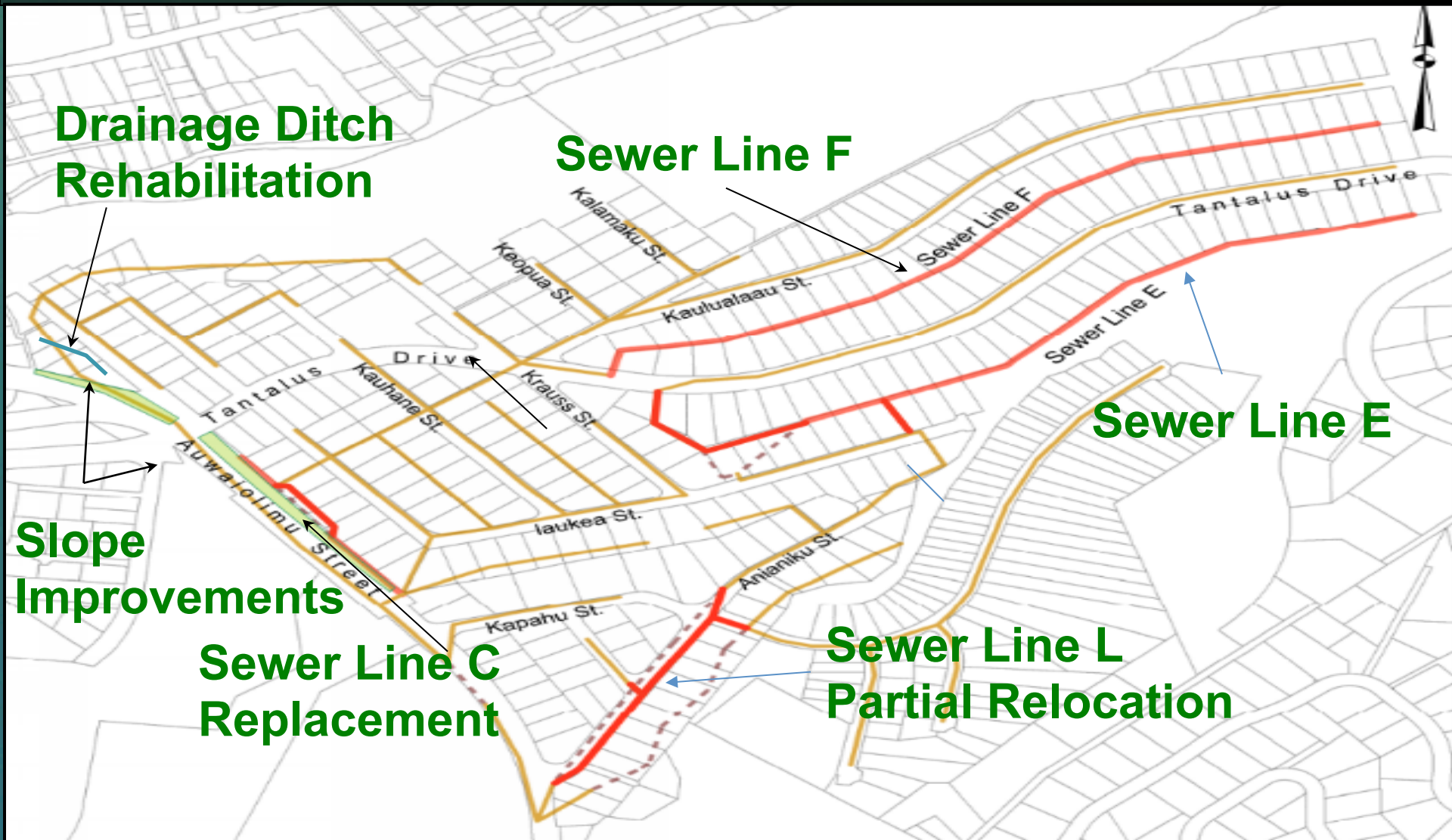


Total cost: \$13 Million



Total est. cost: \$45 Million

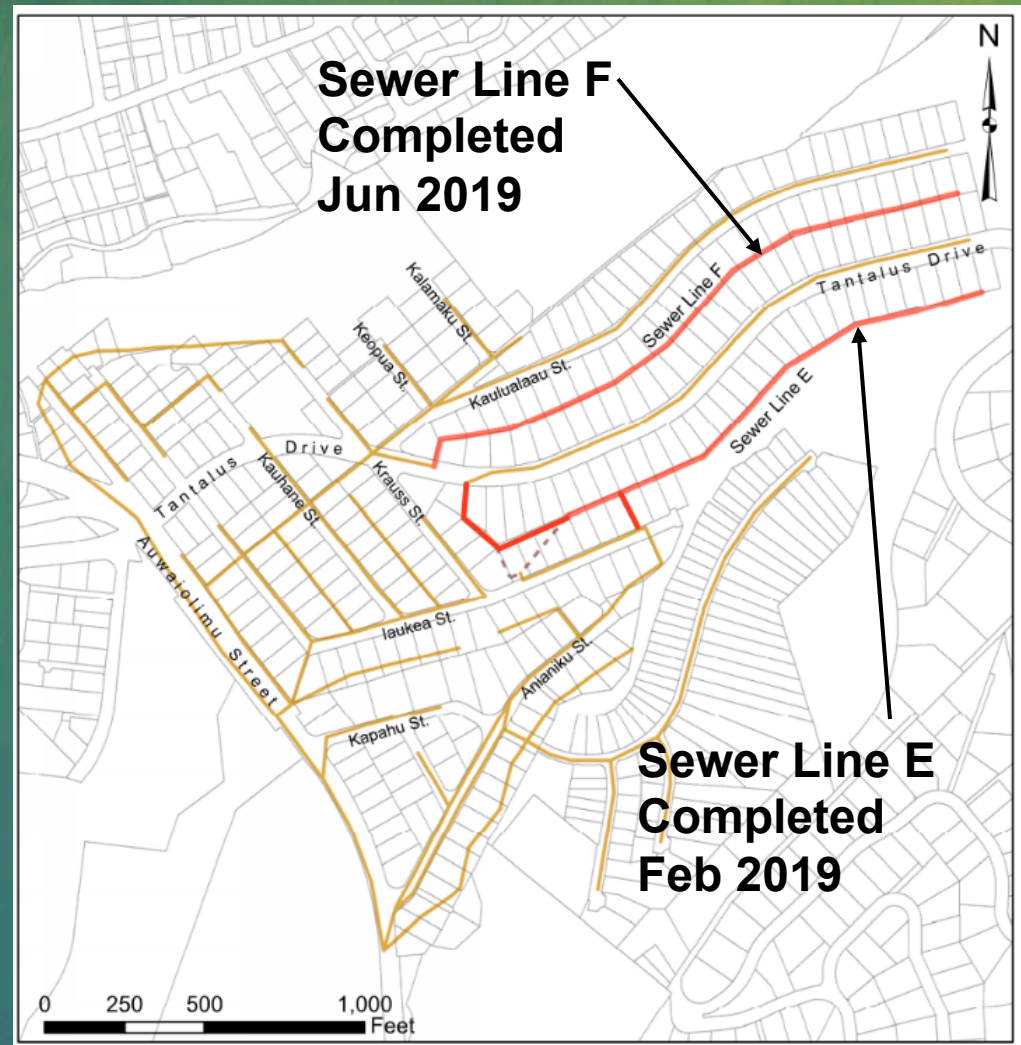
Papakolea Sewer Improvements Phase 1



Papakolea Sewer Improvements

Phase 1 – Sewer Line E & F

- 65 Lots
- 4,200 Linear feet
- 28 New sewer manholes
- Cost: \$5.5 Million



Papakolea Sewer Improvements Sewer Line E

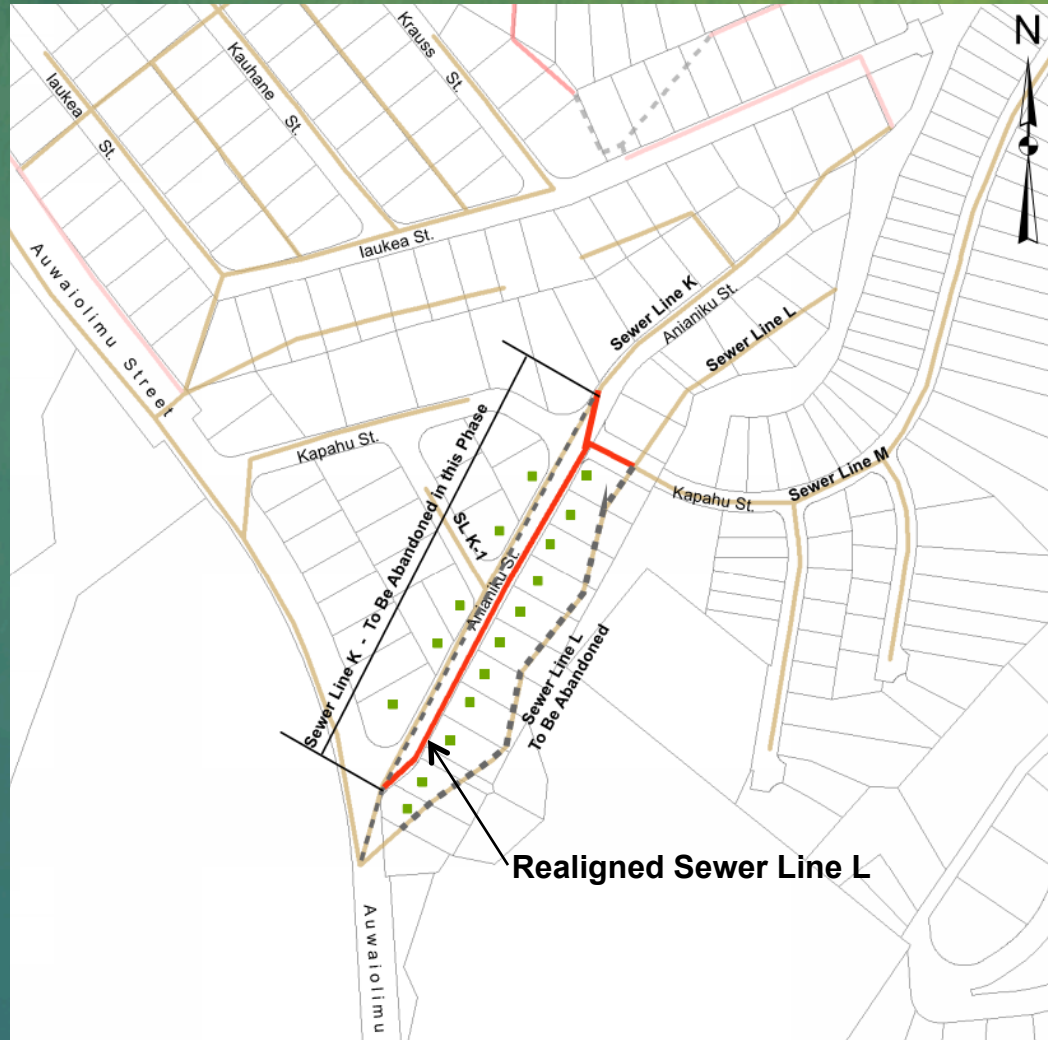
Sewer Line E:

- Realigned and rerouted sewerline and manhole to avoid bisecting properties



Papakolea Sewer Improvements Phase 1 – Sewer Line L Realignment

- 900 LF, 10-inch pipe
- 6 New sewer manholes
- 16 Lateral reconnections
- Abandon existing Sewerline K and L in place
- Completion: September 2019
- Cost: \$1.3 Million



Papakolea Sewer Improvements

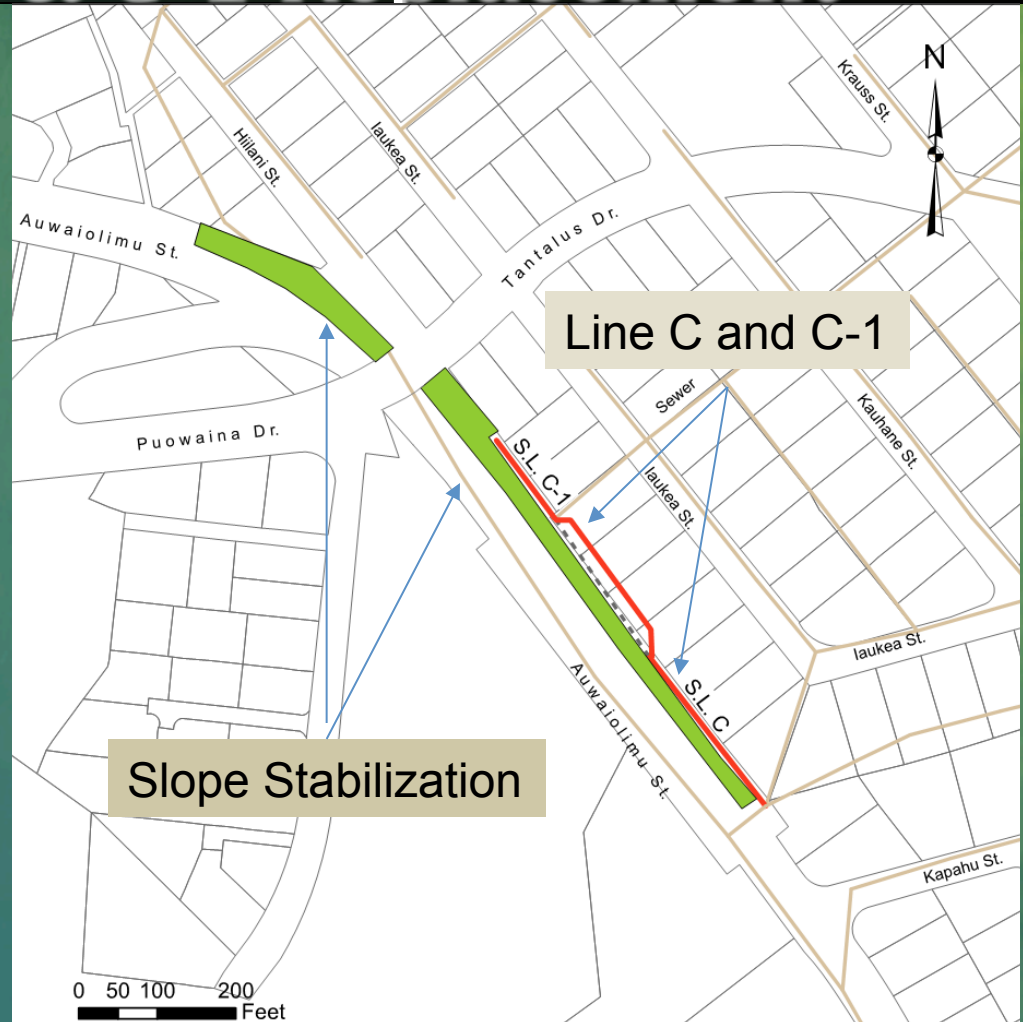
Slope Stabilization and Sewer Line C & C-1 Replacement

Slope Stabilization

- 34,000 square feet
- Completed June 2018
- Cost: \$4 Million

Sewer Line C & C-1

- Est. Completion August 2019
- 520 Linear feet, 8" pipe
- 5 New sewer manholes
- Cost: \$0.7 Million



Papakolea Sewer Improvements Slope Stabilization

Before Project



Fallen Rocks
Within
sidewalk
area



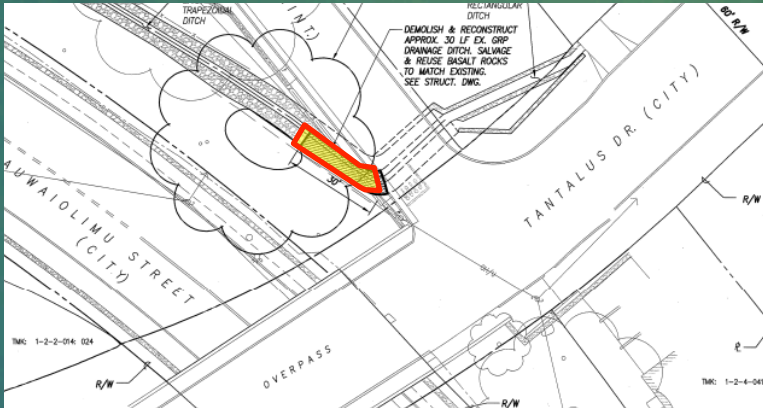
Papakolea Sewer Improvements Slope Stabilization

After



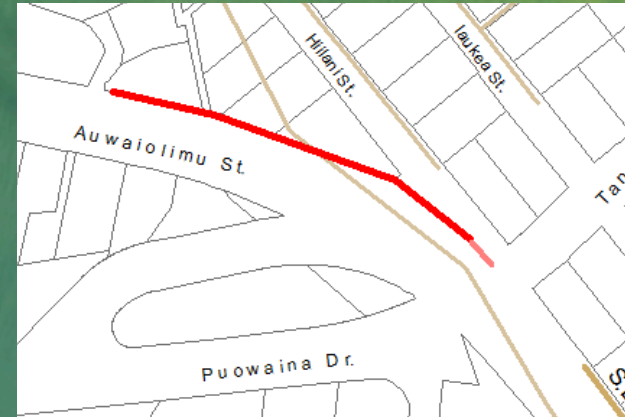
Drainage Ditch Rehabilitation

Original Scope - 30 LF



Drainage Ditch Rehabilitation

Ditch is a historical architectural feature, and required restoration only.



Ditch Rehabilitation



Cost of 350 linear feet of drainage improvements: \$0.3 Million

Future maintenance by DHHL



Papakolea Sewer Improvements

Sewer Easement Conditions

- Lessees shall allow contractors access to repair or replace sewerlines.
- Lessees shall not block, build nor plant trees over sewerline and other improvements.
- Any improvements over the sewerline will NOT be replaced by the City or DHHL, should repair work be required.
- Sewer lateral maintenance, including blockage remediation is the responsibility of the Lessee.
- Hawaiian Homes Commission approval required to amend approximately 46 leases with new sewer easements.

Papakolea Sewer Improvements Phase 2

- **Initiate engineering designs in 2019**
- **Estimated Start of Construction 2022, subject to funding**
- **12,000+ Linear feet, 8-in pipe sewer manholes & laterals**
- **Evaluate phasing and disposal options for Sewer Line A**
- **Cost: Approx. \$45 million**

