



MEMORANDUM

TO: CITY COUNCIL

FROM: BILL ROBESON, ASSISTANT CITY MANAGER/PUBLIC WORKS DIRECTOR

BY: JILL MCPEEK, CAPITAL IMPROVEMENT PROJECT MANAGER

SUBJECT: CONSIDERATION OF STREETS SELECTION FOR THE 2021 STREET REPAIRS PROJECT, PW 2021-01

DATE: APRIL 27, 2021

SUMMARY OF ACTION:

Review and select streets to be included in the 2021 Street Repairs Project.

IMPACT ON FINANCIAL AND PERSONNEL RESOURCES:

A total of \$1,843,037 is available for the Pavement Management Program budget in FY 2020-21, consisting of \$63,000 of Urban State Highway Account (USHA) funds, \$307,200 of Senate Bill 1 (SB1) monies, and \$1,472,837 of Local Sales Tax funds. Of the overall budget, it is estimated \$1,408,300 will be used for construction and \$140,776 for construction contingencies. The remaining \$293,961 will be used to pay for engineering, testing, design specifications, and final retention payment to the contractor of last year's project. This type of payment is held for 35 days to ensure all liens are cleared, due to the timeframe of this payment, the payment crossed over last year's fiscal year into the current fiscal year.

RECOMMENDATION:

It is recommended the City Council review the potential streets for the 2021 Street Repairs Project and select Option 2 - Correct Base Failures (Digouts) and Alligator Cracking.

BACKGROUND:

On April 10, 2018, the City Council reviewed treatment options for the 2018 Street Repairs project (James Way) and selected Alternative 1 - Digouts and Overlay, as the preferred alternative. For this alternative, it was estimated that 2-1/2 years of the City's Pavement Management Program budget would be dedicated to James Way. As follow-up to Council's action, the digouts were completed in Summer 2018 and the curb ramps and overlay were scheduled to be performed in the subsequent years (e.g., 2019 and 2020).

However, due to ongoing deterioration and the winter rains of 2019, two vital arterials, West Branch Street and Traffic Way, reached a critical point of deterioration that would have moved into a full "reconstruction category" without immediate repairs to multiple segments. In response, on June 11, 2019, Council approved digout improvements on

**CITY COUNCIL
 CONSIDERATION OF STREETS SELECTION FOR THE 2021 STREET REPAIRS
 PROJECT, PW 2021-01
 APRIL 27, 2021
 PAGE 2**

West Branch Street and Traffic Way and delayed the curb ramps and overlay on James Way based on the fact that the digouts previously completed were effective and could hold up another year or two without deteriorating while awaiting a full overlay treatment. In addition, Council approved refreshed striping on James Way while it awaits an overlay. In consideration of upcoming years of streets repair (2022, 2023, 2024), staff may continue to recommend delaying the overlay treatment step at James Way due to other more critical conditions that are occurring on other street segments.

ANALYSIS OF ISSUES:

Staff and the City’s pavement design engineering consultant, Pavement Engineers Inc. (PEI) have analyzed James Way, West Branch Street, and Traffic Way and found that the digouts previously completed remain effective and will defer significant deterioration while awaiting a top surface overlay treatment. Based on this, staff and its pavement design engineering consultant suggest that continuing to correct base failures (digouts) is the best course of action for the 2021 Street Repairs Project and the best way to stretch the available budget and slow the deterioration of certain streets to help avoid near-term reconstruction.

The following factors are used by City’s Public Works Streets Division staff and the City’s pavement design engineering team to prioritize street segments for repair:

- visual observations of street conditions
- assessment of safety issues caused by asphalt conditions
- most heavily traveled streets (degree and intensity of use)
- cost of deferring maintenance (focused structural digouts versus full replacement and reconstruction) based on annual funding allocations
- frequency of street maintenance issues (cost and time commitment)

The streets listed below were found to be in the most urgent condition based on multiple observations and assessments:

Street Segment	From	To
Valley Road	Sunrise Terrace	Los Berros Creek Bridge
Corbett Canyon Road	Route 227	City Limits (n/o Gularte Rd)
Fair Oaks Avenue	South Halcyon Road	Fred Grieb Bridge
Wesley Street	End of Street (n/o of Larchmont Dr)	West Branch Street
Vernon Street	End of Street (n/o of Larchmont Dr)	West Branch Street
East Grand Avenue	Halcyon Road	El Camino Real
North Halcyon Road	El Camino Real	East Grand Avenue
South Elm Street	Ash Street	City Limits (s/o Paul Place)
Rancho Parkway	James Way	West Branch Street

**CITY COUNCIL
 CONSIDERATION OF STREETS SELECTION FOR THE 2021 STREET REPAIRS
 PROJECT, PW 2021-01
 APRIL 27, 2021
 PAGE 3**

In order to determine the structural adequacy of the pavement of these nine streets, deflection testing and core sampling was performed by the City’s design engineer. Through this work, it was found that the streets have differing degrees of structural deficiencies and that \$13,000,000 would be needed to fully rehabilitate (replacement and reconstruction) the pavement on all nine streets. Current budget levels do not allow full rehabilitation so the “spot treatment maintenance” option, also known as digout segments, was evaluated with the intention of providing the highest estimated service life while stretching the amount of the available budget.

Two maintenance options are considered appropriate options for these streets:

- Option 1 – Correct Base Failures (Digouts) Only
- Option 2 – Correct Base Failures (Digouts) and Alligator Cracking (which progresses to base failure)

Based on the available budget of \$1.4M for construction, it is estimated that the following streets and repairs can be accomplished under each Option.

Street Segment	Option 1 - Correct Base Failures Only (Digouts) Expected Service Life 3 - 5 Years	Option 2 - Correct Base Failures (Digouts) and Alligator Cracking Expected Service Life 5 - 7 Years
Valley Rd - Sunrise Terrace to Bridge	\$ 113,000	\$ 149,000
Corbett Cyn Rd - Rte 227 to City Limits	183,000	184,000
Fair Oaks Ave - S Halcyon to Bridge	167,000	230,000
Wesley Street - End Street to W Branch	79,000	95,000
Vernon Street - End Street to W Branch	91,000	132,000
S Elm Street - The Pike to City Limits	64,000	166,000
E Grand Ave - Halcyon to ECR	289,000	382,000
N Halcyon Rd - ECR to E Grand Ave	230,000	351,000
S Elm Street - Ash St to Farroll Ave	330,000	525,000
S Elm Street - Farroll Ave to The Pike	37,000	162,000
Rancho Pkwy - James Wy to W Branch	489,000	713,000
Total	\$ 1,216,000	\$ 1,338,000

Option 1 treats more streets but results in shorter service life for the treated streets, while Option 2 treats less streets but provides longer service life for the treated streets. Based on available funding and the goal of extending the service lives of the treated streets, staff recommends selecting Option 2. Although the number of streets repaired will be less, this

**CITY COUNCIL
CONSIDERATION OF STREETS SELECTION FOR THE 2021 STREET REPAIRS
PROJECT, PW 2021-01
APRIL 27, 2021
PAGE 4**

option will provide longer service life and more extensive repairs on these heavily used streets. This approach will allow the City to focus on and support these streets rather than spreading out more minimal asphalt treatments.

ALTERNATIVES:

The following alternatives are provided for the Council's consideration:

1. Approve staff's recommended treatment of Option 2 - Correct Base Failures (Digouts) and Alligator Cracking; or
2. Approve Option 1 - Correct Base Failures Only (Digouts); or
3. Direct Staff to investigate other potential streets; or
4. Provide other direction to staff.

ADVANTAGES:

Utilizing the Option 2 approach will provide longer service life due to the more extensive repairs.

DISADVANTAGES:

Selection of either option reduces available funding for other needed street maintenance projects.

ENVIRONMENTAL REVIEW:

The project is categorically exempt from the California Environmental Quality Act (CEQA) pursuant to CEQA Guideline Section 15301(c) covering the repair and maintenance of existing streets, sidewalks, gutters and similar facilities.

PUBLIC NOTIFICATION AND COMMENTS:

The Agenda was posted at City Hall and on the City's website in accordance with Government Code Section 54954.2.