



John Smith Road Landfill Expansion Planning Commission Hearing

October 25, 2023

Second Public Hearing

Continued from October 11, 2023

San Benito County
Resources Management Agency

County Team

- **Resource Management Agency Staff**
 - Abraham Prado, Director of Planning, Building & Code Enforcement
 - Steve Loupe, Public Works Administrator/County Engineer
 - Celina Stotler, Manager, Integrated Waste Management (IWM)
 - Arielle Goodspeed, Senior Planner
- **County Consultants**
 - Stan Ketchum, Principal Planner
 - Richard Grassetti, Grassetti Environmental Consulting
 - Paul Miller, RCH Group
 - Sangeeta Lewis, P.E., Lewis Engineering
 - Joe Ririe, P.E., Pavement Engineering Inc.
 - Bre Moebius, Hefner Law



Landfill Expansion Planning Commission Hearings

Wednesday, October 25 6:00 p.m.	Friday, October 27 6:00 p.m.	Monday, October 30 6:00 p.m.
<ul style="list-style-type: none"> • Project Description • Requested Approvals • Overview of CEQA Process • Alternatives Analyzed • Proposed and Alternative Truck Haul Routes, including noise, air quality, and litter removal • Fair Share Road Impact Analysis • Public Comment Limited to the Topics Addressed 	<ul style="list-style-type: none"> • Mitigation Measures and Conditions of Approval • Significant and Unavoidable Impacts (Greenhouse Gases, Aesthetics, and Cumulative) • Groundwater and Landfill Liners • Water Supply • Odor and Lighting • Economic Analysis • Public Comment Limited to the Topics Addressed 	<ul style="list-style-type: none"> • Staff to address any remaining questions and provide any requested revisions for consideration. • Any remaining Public Comment • Planning Commission Deliberations and Decision

After receiving public comment, the Planning Commission voted at the noticed public hearing on October 11, 2023 to continue the hearing to October 25, 2023 and follow the schedule above.



General Process Today

- ▶ County presentation
- ▶ Applicant presentation
- ▶ Any clarifications from County staff and consultants
- ▶ Public Comment limited to topics in presentations today
- ▶ Questions and comments from Commissioners
- ▶ Commission vote to continue the public hearing to Friday, October 27, 2023 at 6:00 p.m.



Hearing Considerations

- ▶ Hearing continued from October 11, 2023
 - Confirm Commissioners absent on October 11, 2023 have watched the hearing, including all prior public comments.
- ▶ Commissioner disclosures of any ex parte communications or information.



Requested Project Approvals and Decisions

▶ **Conditional Use Permit (“CUP”)**

- Planning Commission makes decision on CUP.
- CUP will establish certain project features, including:
 - Daily tonnage, which could be 2,300 tpd as proposed or a lower tonnage.
 - If a reduced tonnage is approved, whether the CUP will allow the landfill to operate until it reaches the proposed footprint and elevation at closure or whether the reduced tonnage will be approved for a reduced footprint limiting the duration of the CUP to 65 years or shorter duration.
 - Approved haul route for the commercial haul trucks.

▶ **General Plan Amendment**

- Rangeland (R) and Agriculture (A) land use designations to Public Quasi Public (PQP).
- Planning Commission makes recommendation to Board of Supervisors.
- If approved, conditional use permit cannot take effect unless and until Board of Supervisors approves the General Plan amendment.
- Existing zoning allows private enterprise performing governmental functions, which includes government function of disposal of non-hazardous household waste.



Limited Staff Recommendations

- ▶ County staff is not making a recommendation on the Conditional Use Permit, daily tonnage, commercial haul route, or General Plan amendment.
 - Applicant is requesting the Planning Commission adopt the Best Road Haul Route as the commercial haul route.
- ▶ Resource Management Agency recommends Planning Commission certify the EIR as it performs the environmental analysis required by CEQA.
- ▶ County Integrated Waste Management recommends Planning Commission include the composting alternative.



CEQA Environmental Process

Project Application - January 20, 2021

Public Scoping Meetings - March 10 and 11, 2021

Notice of Preparation of Environmental Impact Report (“EIR”) - February 22, 2021

45-Day Public Review of Draft EIR - July 15, 2022 to September 6, 2022

Public Presentation to County Landfill Standing Committee - August 24, 2022

**Final EIR with Responses to Comments
and Mitigation Monitoring and Reporting Program** - September 27, 2023

Public Hearings and Certification of EIR

Planning Commission decides whether to certify EIR for Conditional Use Permit.
Board of Supervisors decides whether to certify EIR for General Plan Amendment and
Conditional Use Permit, if appealed.



Approvals Required

- ▶ Actions Required to approve expansion project
 1. Certification of the Final Environmental Impact Report; adopt CEQA Findings of Fact and Statement of Overriding Considerations; adopt mitigation measures to reduce any significant environmental impacts where feasible, as recommended in the EIR; and adopt the Mitigation Monitoring and Reporting Plan.
 2. Adopt a Conditional Use Permit, including determination of maximum tons per day and the haul route for commercial trucks. Board approval of the General Plan amendment is required for the Conditional Use Permit to take effect.



Approvals Required, cont.

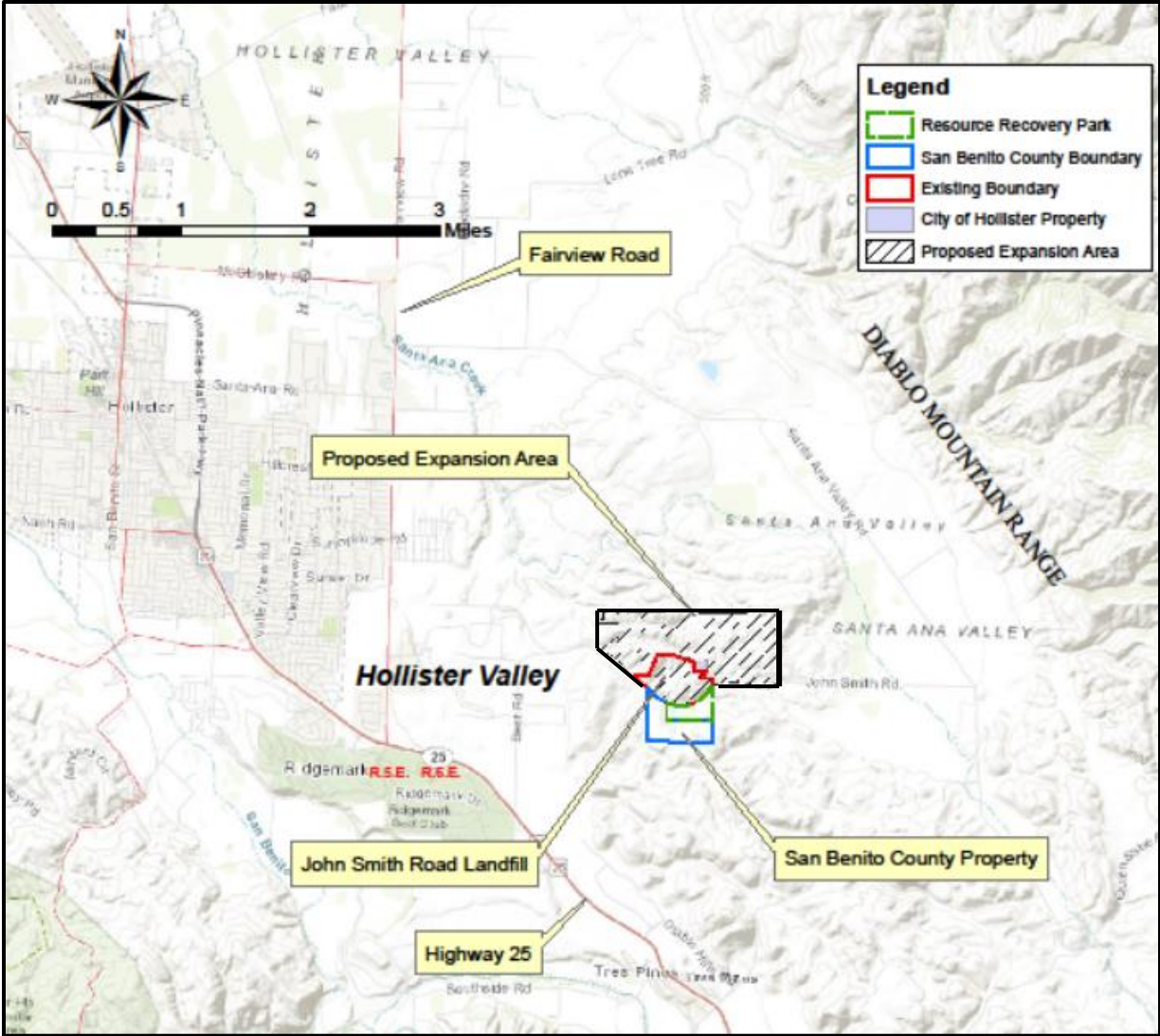
3. Recommend that the Board of Supervisors certify the EIR; adopt CEQA Findings of Fact and Statement of Overriding Considerations; adopt mitigation measures to reduce significant environmental impacts; and adopt a Mitigation Monitoring and Reporting Plan.
4. Recommend that the Board of Supervisors approve a General Plan amendment to change the land use designations from Rangeland (RG) and Agriculture (A) to Public Quasi Public (PQP).



Project Description



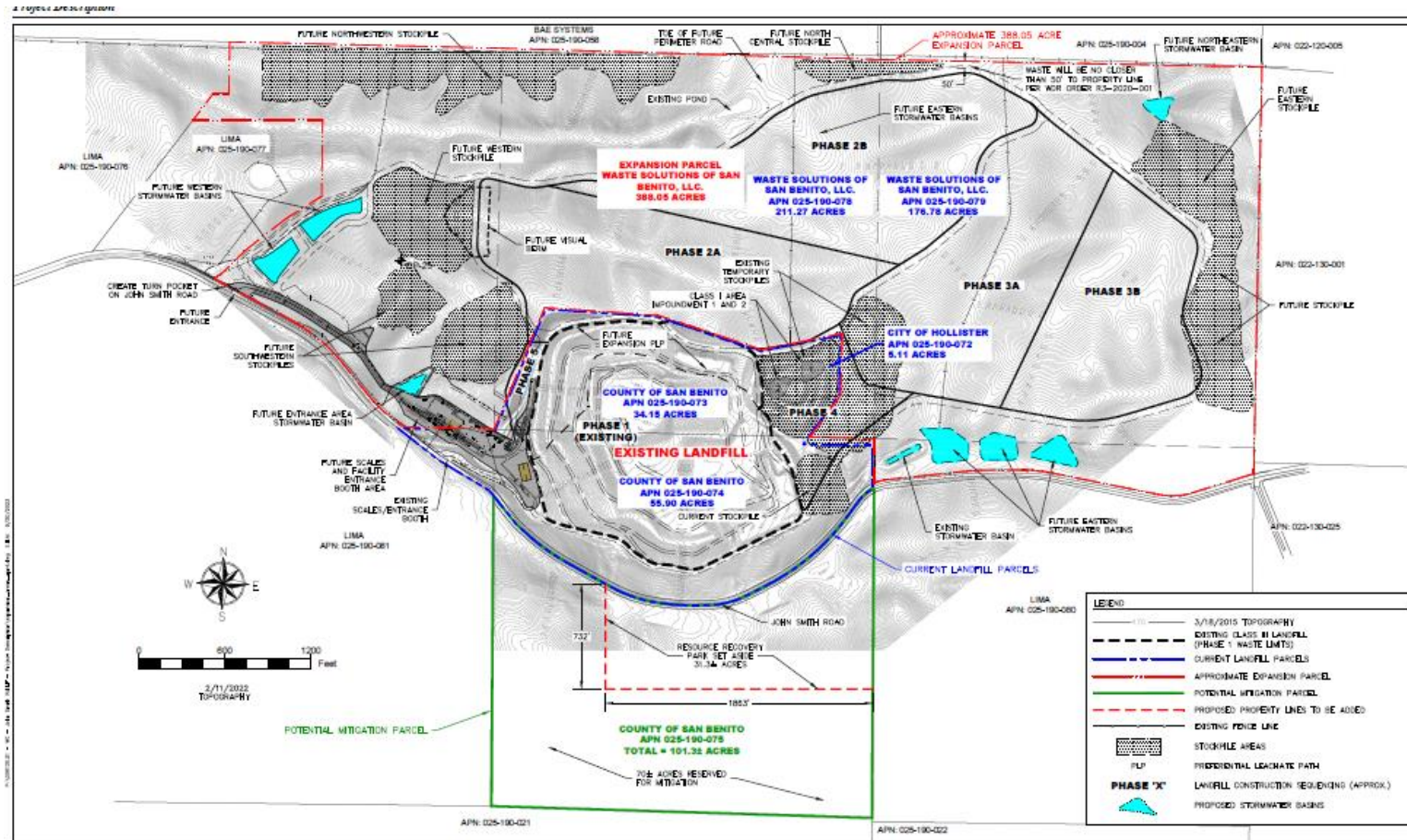
Landfill Location



Landfill Location



Landfill Expansion Site Plan



Landfill Expansion Components

Baseline	Proposed
95.16 acres	Addition of 388.05 ac. = total 483.21 ac.
9.3 million cu. yds. gross airspace capacity	48 million cu. yds. airspace capacity
58 ac. waste footprint	Addition of 252.74 ac. = total 310.74 ac.
920 ft. max. landfill final elevation	Addition of 29 ft. = total 949 ft. max. elevation
1,000 tons per day accepted	2,300 tons per day accepted
Unlimited waste for beneficial use	Unlimited waste for beneficial use



Operational Changes

Environ. Control & Monitoring Systems	Lechate/gas collection, Groundwater monitoring
Renewable Natural Gas (RNG) Facility	Convert landfill gas to natural gas
Expanded Litter & Dust Control	Off-site collection, 24-hr. hotline, signage
Class I Area Clean Closure	Remove hazardous waste, convert to Class III
Commercial Vehicle Haul Route	Select from alternate routes
Expanded Entrance Area – 1.5 to 5.0 ac.	Lengthen entrance roadway – 800' to 1,900'
Water Supply	On-site basins, off-site well, Sunnyslope trucked-in
Habitat Mitigation Area	County-owned 70 ac. available



Expanded Litter & Dust Control

- ▶ On-site activities
 - Daily cover of exposed refuse
 - Permanent/temporary litter fences
 - On-site litter collection
 - Truck wheel wash
 - Road watering
- ▶ Off-site improvements
 - Haul route litter collection program (min. 3x/week)
 - 24-hour litter hot-line/monthly report to IWM
 - Litter complaints – 48 hr. response
 - Monthly Best Road litter pick-up (if not haul route)
 - Haul route signage re: tarping
 - Site entrance camera



Renewable Natural Gas (RNG) Facility

- ▶ Buried organic materials generate landfill gas (methane + CO²)
- ▶ Methane & CO² are greenhouse gases
- ▶ RNG facility will extract & process 92% of methane from landfill
- ▶ RNG product is bio-methane (= natural gas)
- ▶ Gas transported via buried pipeline 1 mile to PG&E pipeline
- ▶ Remaining methane combusted in on-site flare
- ▶ Fully operational before project produces approx. 550 cfm at approx. 50 % methane (annual average) of recovered landfill gas



Class I Area Clean Closure

- ▶ Former 0.79-ac. liquid hazardous waste disposal site (1977-83)
- ▶ Closed in 1992
- ▶ Clean Closure
 - Excavate & remove remaining hazardous waste
 - Transport to Class I disposal facility
 - Verify all contamination removed
 - Convert into additional Class III disposal area
- ▶ Applicant has only proposed a clean closure of Class I with 2,300 tons per day, but Applicant could agree to clean close the Class I area with approval of less daily tonnage.



County Property for Habitat Mitigation

- ▶ 70 acres of 101.3-acre County property south of John Smith Road
- ▶ Potential mitigation site for sensitive species impacts
- ▶ Conservation easement for permanent habitat management



Alternatives Analyzed in EIR and Commercial Haul Routes



Project Alternatives

Project Landfill Alternatives	
1A: 1,700 TPD	Match project gross airspace, footprint
1B: 1,700 TPD	Reduced gross airspace, footprint
2A: 1,000 TPD	Match project gross airspace, footprint
2B: 1,000 TPD	Reduced gross airspace, footprint
3: 300 TPD	Reduced gross airspace, footprint
4. Southern Landfill	Separate landfill on 101.3-ac County parcel
5: Transfer Station	Future transfer station – after JSRL closes in 15 years (in-county only)
No Project Alt.	Compare impacts of approving project to impacts of not approving project



Project Alternatives

Project Component Alternatives	
6: South Fairview Road Haul Route	SR 25, Fairview Road, John Smith Road
7: Best Road Haul Route	SR 25, Best Road, John Smith Road
8: Compost Facility	Compost facility on 101.3-ac. County parcel or project site

- Applicant has requested the Best Road Haul Road be selected.
- County Integrated Waste Management (IWM) is recommending inclusion of the compost facility alternative.

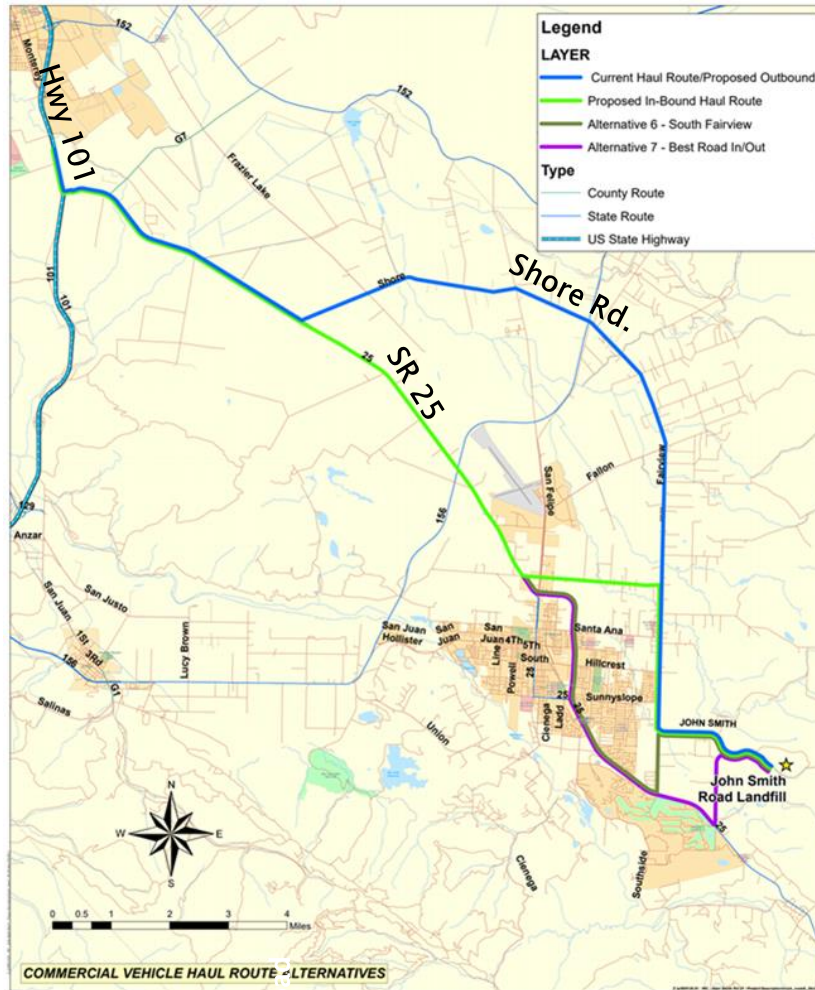


Addition of Compost Alternative

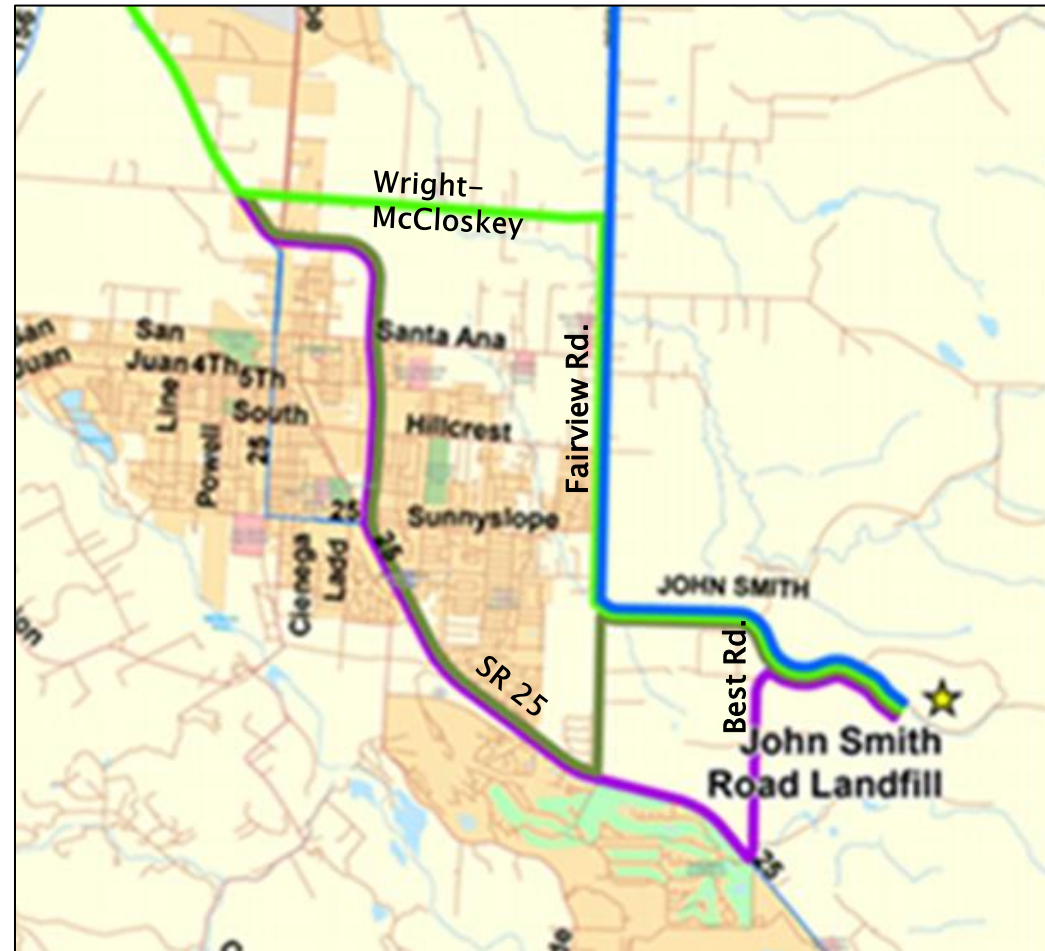
- Recommend addition of composting alternative.
- Importance of including composting alternative:
 - Assists County with meeting State's increasing organic waste diversion requirements (SB 1383), including that expanded landfills "shall implement organic waste recovery activities."
 - County does not have long-term plans to meet State diversion mandates.
 - Opportunity for County to apply for State grants for composting.
 - Opportunity for County or third-party to compost in the future.
 - Any compost facility would be limited to food, wood, and green waste.
 - Increased diversion through composting will extend the life of landfill.
- Including composting alternative will not require Waste Solutions to construct, operate, or fund a future compost facility.



Commercial Vehicle Haul Routes



Commercial Vehicle Haul Route - Options



Traffic Noise for Haul Routes

▶ Haul Route Traffic Noise

- EIR analyzed potential traffic noise impacts from use of the current route, proposed outbound route, and the Best Road alternative route (100 feet from roadway centers).
- Increase in new vehicle trips results in up to ~1 dBA, Ldn increase along McCloskey Road, Fairview Road, and Shore Road haul route segments (segments currently range from 60 to 68 dBA, Ldn and future noise levels range from 61 to 68 dBA, Ldn) and ~2 dBA, Ldn increase along John Smith Road haul route segment (from 61 to 63 dBA, Ldn).
- Best Road alternative route results in a substantial increase (7 dBA, Ldn) of vehicle noise for residents along Best Road – approximate increase would be from 51 to 58 dBA, Ldn.
- However, resulting noise level of 58 dBA, Ldn along Best Road route would not exceed the County transportation noise threshold of 60 dBA, Ldn for residential uses.



Traffic Noise for Haul Routes

**Table 4.5-7
Estimated Traffic Noise Levels Along Roadways in the Proposed Project Vicinity**

Noise Level, dB, L _{dn}										
Roadway ^{1,2}	Segment	Existing (A)	Existing + Project (B)	Change Existing + Proposed Project from Existing (B-A)	Significant? (Yes or No) ³	2035 No Project (C) ⁴	Change 2035 No Project from Existing (C-A)	2035 + Project (D)	Change 2035 + Proposed Project from 2035 No Project (D-C)	Significant? (Yes or No)
McCloskey Road	San Felipe Road to Fairview Road	63.0	64.1	1.1	No	70.5 ⁵	<u>7.5</u>	70.8	0.3	No
Fairview Road	McCloskey Road to Santa Ana Road	66.0	66.8	0.8	No	72.4	<u>6.4</u>	72.5	0.1	No
	Santa Ana Road to Hillcrest Road	66.7	67.4	0.7	No	73.0	<u>6.3</u>	73.1	0.1	No
	Hillcrest Road to John Smith Road	67.7	68.2	0.5	No	72.0	<u>4.3</u>	72.2	0.2	No
	McCloskey Road to Fallon Road	66.6	66.8	0.2	No	70.1	<u>3.5</u>	70.1	0.0	No
	Fallon Road to State Route 156	66.6	66.8	0.2	No	70.1	<u>3.5</u>	70.1	0.0	No
Shore Road	San Felipe Road to Frazier Lake Road	65.7	65.9	0.2	No	66.8	1.1	67.0	0.2	No
	Frazier Lake Road to State Route 25	60.4	61.0	0.6	No	64.0	<u>3.6</u>	64.3	0.3	No
John Smith Road	Fairview Road to Best Road	60.6	62.8	2.2	No	61.1	0.5	63.1	2.0	No

Bold and Underlined numbers represent significant increases in noise levels resulting from cumulative traffic in the County, not significant impacts from the proposed project.

1. Road center to model receptor is 30 meters (approximately 100 feet) for values shown in this table. Noise levels were calculated using the FHWA Traffic Noise Prediction Model (FHWA-RD-77-108). An attenuation rate of 4.5 dB was used as traffic noise is a line source and the ground absorption characteristics were soft sites for all the modeled locations.

2. Vehicle mix, speed and volumes from PHA Associates, 2022

3. Significance Criteria: Significant if the incremental increase in noise is greater than 3 dB, L_{dn}, and a resulting noise level exceeding 60 dB, L_{dn}.

4. 2035 cumulative traffic from Revised Draft Environmental Impact Report 2035 San Benito County General Plan Update Chapter 19 Transportation and Circulation 2015a.

5. 2035 ADT on McCloskey Road assumes the buildout of Memorial Drive.

Source: RCH Group, Inc. 2022 and Revised Draft Environmental Impact Report 2035 San Benito County General Plan Update Chapter 19 Transportation and Circulation 2015a.

Air Quality for Haul Routes

- ▶ The Haul Route Alternative only changes the routes, not the amount of waste transported by heavy duty trucks.
- ▶ South Fairview Alternative & Best Road Alternative Routes would not alter the number of vehicle trips & would not substantially alter the vehicle miles.
- ▶ Air Quality Emissions and Greenhouse Gas Emissions from these heavy-duty trucks would not change.



GHG Emissions from Haul Trucks

- ▶ The EIR identified project GHG emissions as a significant and unavoidable impact of the project.
- ▶ Several GHG emission reducing measures are included in the project including the RNG facility and Mitigation Measures have been added to reduce GHG emissions.
- ▶ Haul vehicles are a major contributor to GHG emissions.
- ▶ Most haul trucks are diesel fueled now. The EIR assumed that 60% of haul vehicles would be zero-emission vehicles (ZEV) by 2040.
- ▶ California continues to regulate for ZEV cars and trucks. Advanced Clean Fleets (ACF) regulations are the latest regulations (July 2023). The regulation will increase the availability of ZEV trucks. Manufacturers are to only manufacture ZEV trucks starting in the 2036 model year.
- ▶ California is discouraging the use of CNG trucks (because of higher GHG emissions)
- ▶ Biodiesel, Renewable Diesel, and Renewable Natural Gas (RNG) trucks all reduce GHG emissions, if available.



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GHG Mitigation for On-Site Equipment

- ▶ Mitigation Measure 4.4(d)(2) requires conversion of on-site pick-up trucks and construction equipment to renewable energy and continued evaluation of the feasibility of converting on-site water trucks and heavy equipment as technology and availability improves:
 - “Before waste is placed in the first new expansion cell, **convert pick-up trucks and light construction equipment, such as small excavators and loaders, to a renewable energy power source** (i.e., renewable diesel, RNG or electricity).”
 - “Before waste is placed in the first new expansion cell or as soon as commercially available and proven (i.e., with comparable product support, suitable for the necessary work, and reliability), convert water **trucks and heavy equipment**, such as compactors and dozers, to renewable energy power source or electricity. If not commercially available and proven before waste is placed in the first new expansion cell, purchase of replacement must occur within four months of such equipment being commercially available and proven, and placement of such purchased equipment into operation must take place as soon as is commercially reasonable. For any heavy equipment that cannot be converted to renewable energy source or electric because it is not yet commercially available or proven, applicant shall monitor changes in technology and new equipment and include a summary of remaining fleet to be replaced with renewable energy power source or electricity in a written annual report submitted to Integrated Waste Management in December each year explaining why replacement or use of a renewable energy power source is not commercially available or proven. . . .”



Fair Share Road Impact Fee

- ▶ EIR determined that addition of project–related truck trips to County roads impacts pavement and cause roadway hazards without regular adequate rehabilitation, repair, reconstruction, and maintenance of the pavement.
- ▶ Mitigation Measure 4.2–4:
 - Requires Board of Supervisors to adopt fair share fee toward roadway rehabilitation, repair, and reconstruction along the haul route for the life of expansion project.
 - Requires County and applicant to annually evaluate necessary rehabilitation, repairs, reconstruction, or maintenance for the haul route.
 - Fair share fee will be adopted under the Mitigation Fee Act.
 - Maintenance will remain a County responsibility.



SAN BENITO COUNTY

LANDFILL EXPANSION ROAD IMPACT
NEXUS STUDY

OCTOBER 25, 2023

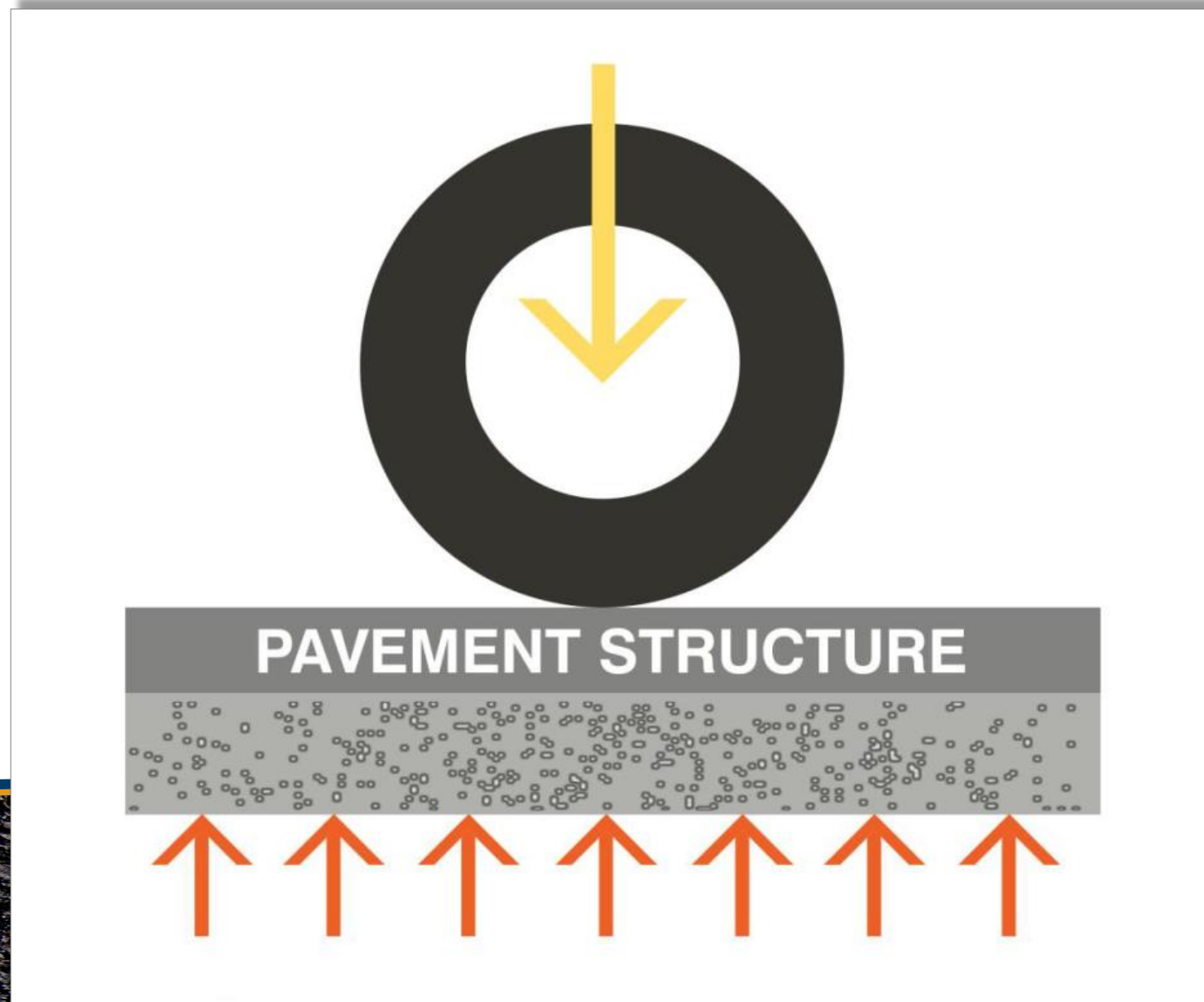
PRESENTATION GOALS

- Pavement 101
- Study Approach

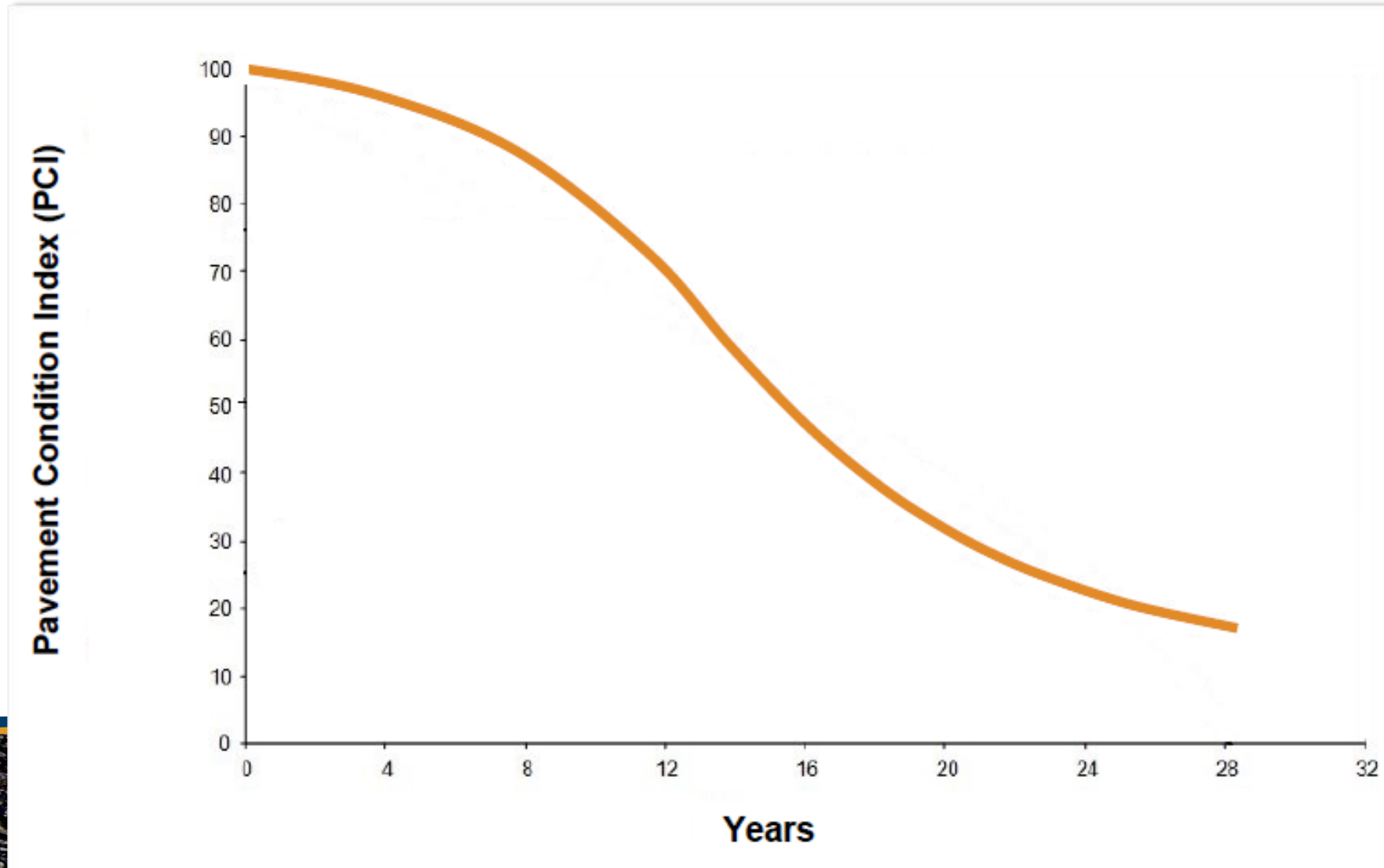
PAVEMENT 101



What Determines a Pavement Section?

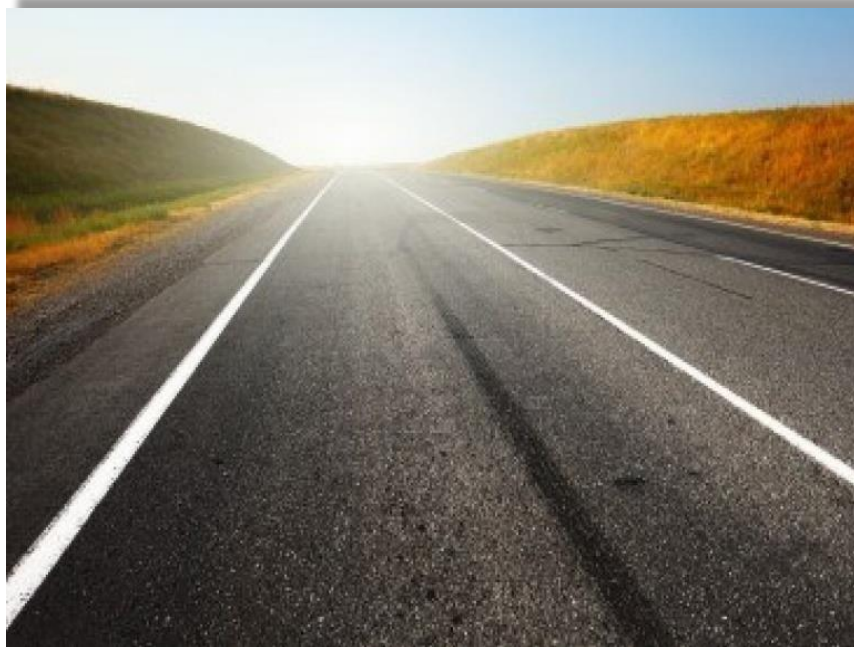


Pavement Deterioration Cycle



Pavement Deterioration

Asphalt concrete deteriorates in two ways:

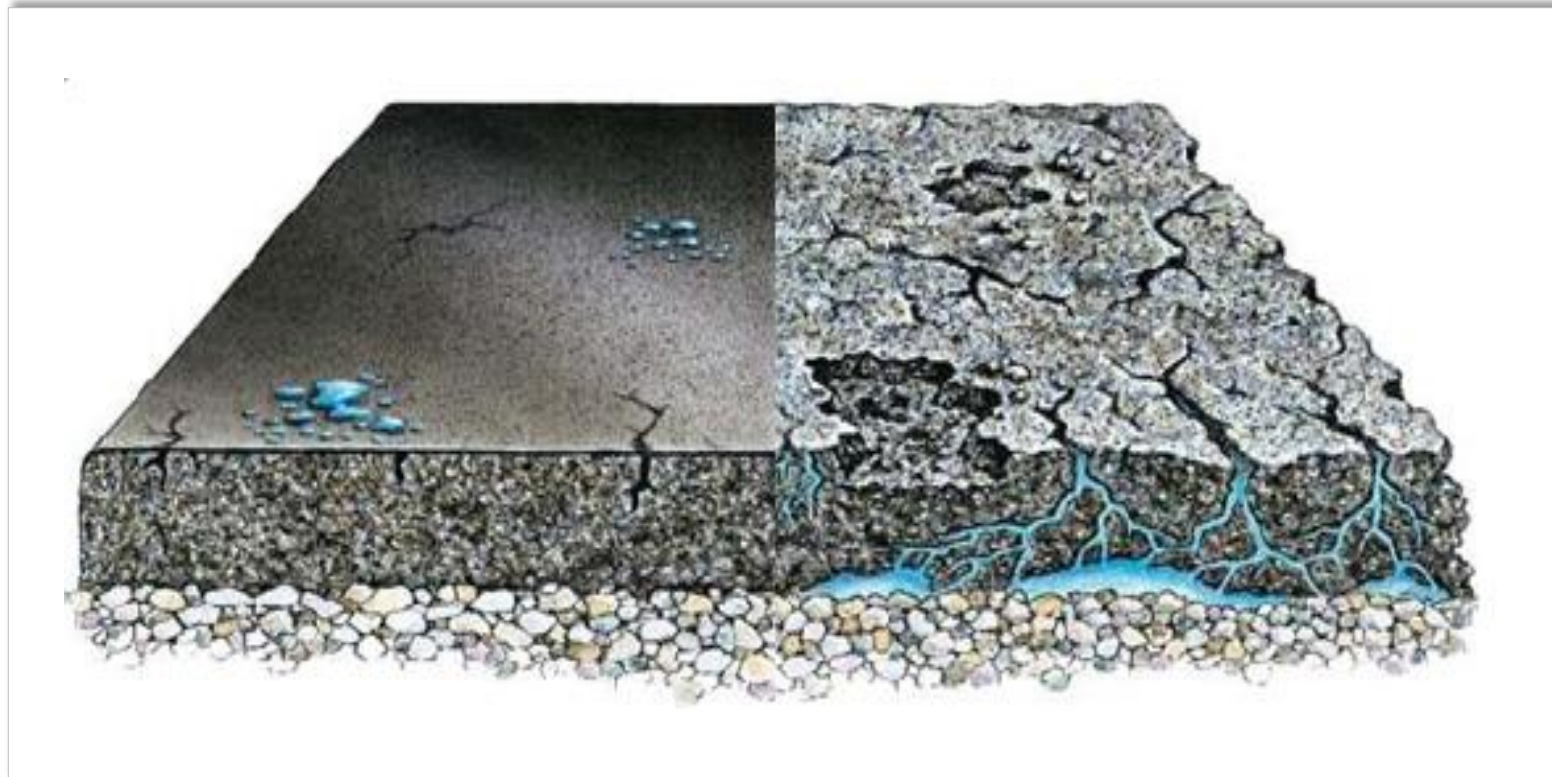


Oxidizing effects of sun and water

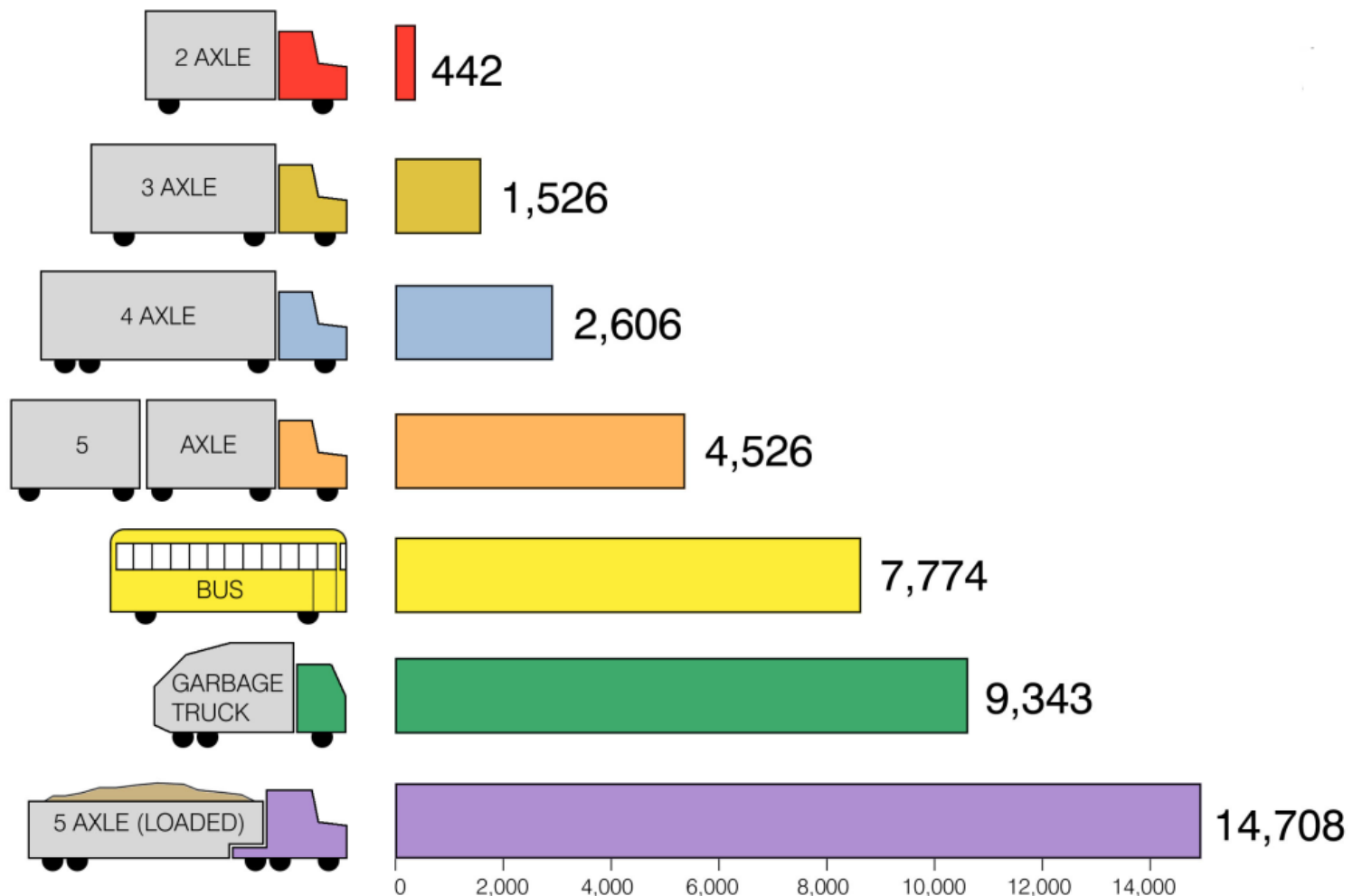


Fatigue from heavy wheel loads

The Impact of Sun and Water



The Impact of Heavy Loads



COMPARATIVE VEHICLE PAVEMENT STRESS

(S-10 BLAZER = 1 VEHICLE UNIT)



Common Pavement Distresses



Weathering or
Raveling



Transverse or
Longitudinal
Cracking



Block
Cracking



Alligator
Cracking

NEXUS STUDY APPROACH



ANALYZED FOUR HAUL ROUTES

Existing Route Shore Road from Hwy 25 to San Felipe Road, Fairview Road from San Felipe to John Smith Road and John Smith Road from Fairview Road to the Landfill Entrance.

Proposed Haul Route Wright Road/McCloskey Road from Hwy 25 to Fairview Road, Fairview Road from Wright Road/McCloskey Road to John Smith Road, John Smith Road from Fairview Road to the Landfill Entrance.

South Fairview Alternative Fairview Road from Hwy 25 (south of John Smith Road) to John Smith Road, John Smith Road from Fairview Road to the Landfill Entrance.

Best Road Alternative Best Road from Hwy 25 (south of John Smith Road) to John Smith Road, John Smith Road from Best Road to the Landfill Entrance.



ANALYZED THREE TONNAGES

- 2,300 tons per day
- 1,700 tons per day
- 1,000 tons per day



STUDY APPROACH

- 1) Calculating the anticipated 20-year design traffic index based on the three daily tonnages and anticipated average trips,
- 2) Determining the needed pavement section to meet the traffic loading for both the anticipated tonnage as well as the typical pavement section based on County standards,
- 3) Developing estimated construction costs and Cost/Per Ton for each route and daily tonnage,
- 4) Develop an intermittent repair schedule with costs,
- 5) Perform an accrual of the monetary impact and
- 6) Provide a comparison of the financial impact.



2,300 Tons Per Day

Haul Route	Estimated Reconstruction Costs			Estimated Per Ton Fee	Est. Repair Cost (18 Years)		Est. Maintenance Cost (18 Years) (County Only)
	Reconstruct to Anticipated Loading	Reconstruct to County Standards (County Share)	Difference (Operator Share)		(County Share)	(Operator Share)	
Existing Route	\$59,289,000	\$36,723,000	\$22,566,000	\$1.68	\$2,328,426	\$1,430,802	\$8,362,226
Proposed Haul Route	\$26,539,000	\$15,218,000	\$11,321,000	\$0.84	\$973,080	\$723,888	\$3,774,827
South Fairview Alternative	\$13,368,000	\$7,561,000	\$5,807,000	\$0.43	\$463,968	\$356,346	\$1,824,742
Best Road Alternative	\$7,187,000	\$4,752,000	\$2,435,000	\$0.18	\$301,590	\$154,530	\$1,014,623



1,700 Tons Per Day

Haul Route	Estimated Reconstruction Costs			Estimated Per Ton Fee	Est. Repair Cost (18 Years)		Est. Maintenance Cost (18 Years) (County Only)
	Reconstruct to Anticipated Loading	Reconstruct to County Standards (County Share)	Difference (Operator Share)		(County Share)	(Operator Share)	
Existing Route	\$55,608,000	\$36,723,000	\$18,885,000	\$1.99	\$2,482,560	\$1,276,668	\$8,362,226
Proposed Haul Route	\$24,965,000	\$15,218,000	\$9,747,000	\$1.03	\$1,034,424	\$662,544	\$3,774,827
South Fairview Alternative	\$12,263,000	\$7,561,000	\$4,702,000	\$0.50	\$505,782	\$314,532	\$1,824,742
Best Road Alternative	\$6,743,000	\$4,752,000	\$1,991,000	\$0.21	\$321,444	\$134,676	\$1,014,623



1,000 Tons Per Day

Haul Route	Estimated Reconstruction Costs			Estimated Per Ton Fee	Est. Repair Cost (18 Years)		Est. Maintenance Cost (18 Years) (County Only)
	Reconstruct to Anticipated Loading	Reconstruct to County Standards (County Share)	Difference (Operator Share)		(County Share)	(Operator Share)	
Existing Route	\$52,662,000	\$36,723,000	\$15,939,000	\$3.23	\$2,621,430	\$1,137,780	\$8,362,226
Proposed Haul Route	\$24,193,000	\$15,218,000	\$8,975,000	\$1.82	\$1,067,436	\$629,532	\$3,774,827
South Fairview Alternative	\$11,886,000	\$7,561,000	\$4,325,000	\$0.68	\$521,820	\$298,494	\$1,824,742
Best Road Alternative	\$6,385,000	\$4,752,000	\$1,633,000	\$0.33	\$339,462	\$116,658	\$1,014,623





Questions?