

Written materials relating to an item on this agenda that are distributed to the legislative bodies within 72 hours before the item is to be considered at its regularly scheduled meeting will be made available for public inspection at the City Clerk's Office, 300 West Third Street 4th Floor during customary business hours. Agenda reports are also on the City of Oxnard web site at www.oxnard.org.



AGENDA
OXNARD CITY COUNCIL
PUBLIC WORKS AND TRANSPORTATION COMMITTEE
Council Chambers, 305 West Third Street
September 17, 2022
Special Public Works & Transportation Committee Meeting
Speed Hump Policy Workshop
Saturday - 10:00 AM to 12:00 PM

Zoom details to call-in for public comment during a meeting:

- 1. Dial Phone Number: (888) 475-4499**
- 2. Enter Meeting ID: 889 8645 6342**
- 3. Passcode: 484242**

If you wish to speak during public comments for a particular item on the agenda, please sign-on by following the zoom calling in steps listed above. Once the Mayor calls for public speakers, **press *9 to raise your hand to inform the City Clerk you would like to speak during the public speaking section for that particular item on the agenda, while in the zoom waiting room.**

This meeting is being held in accordance with Assembly Bill 361, allowing members of the City Council, members of the public and staff to participate via teleconference.

Consistent with City policies imposed to promote social distancing, the facility where the City Council regularly meets is temporarily closed to the public. The public is encouraged to view the meeting from home on Spectrum channel 10, Frontier channel 35, or YouTube at [Youtube.com/oxnardnews](https://www.youtube.com/oxnardnews). Video recordings of the meeting are typically available online following the meeting at the City's website at www.oxnard.org/city-meetings.

*Please see the link for the Measure M pre-recorded presentation video for each item listed on this agenda.

YOU MAY PARTICIPATE IN THE MEETING IN THE FOLLOWING WAYS:

1. EMAILING COMMENTS OR REQUESTING TO SIGN UP TO SPEAK BEFORE THE MEETING

- a. Submit an email to cityclerk@oxnard.org **by no later than 3 p.m. on the Thursday (9/15)** prior to the meeting (Please indicate the agenda item number in the subject line). All email correspondence will be forwarded to the City Council prior to the start of the meeting and made part of the legislative record.
- b. Submit a request to speak **by no later than 3 p.m. on the Thursday (9/15)** prior to the meeting by using the form available at www.oxnard.org/city-meetings, emailing the City Clerk at cityclerk@oxnard.org, or calling the City Clerk at (805) 385-7803.

2. PROVIDING PUBLIC COMMENTS DURING THE MEETING

- a. To provide public comment without requesting to speak prior to the meeting, during the meeting dial (888) 475-4499 and enter the Meeting ID and Passcode listed above as the Zoom details for this meeting.
- b. Public comments on agenda items shall be taken following the announcement of the item. After the item is announced, members of the public shall have three minutes to register or otherwise be recognized for the purpose of providing public comment. During this three-minute time period, public comments may be taken and the City Council or staff may discuss the item being considered or briefly respond to public comments.

Detailed participation instructions can be found at www.oxnard.org/city-meetings.

In compliance with the Americans with Disabilities Act, if you require special assistance to participate in a meeting, please contact the City Clerk's Office at 385-7803. Notice at least 72 hours prior to the meeting will enable the City to reasonably arrange for your accessibility to the meeting.

Agenda Item time estimates: (Presentation / Committee Discussion / Public Comment)

In the event of a disruption which prevents a legislative body of the City of Oxnard from broadcasting a meeting using a call-in option or internet-based service option, or in the event of a disruption within the City's control which prevents members of the public from offering public comment using the call-in option or internet-based service option, the legislative body shall take no further action on items appearing on a meeting agenda until public access to the meeting via the call-in option or internet-based service option is restored. However, if any of the broadcast options are disrupted, but any of the other broadcast options is still available to the public, the legislative body may take further action on items appearing on a meeting agenda without waiting for the disrupted broadcast option(s) to be restored.

* The City has filed pre-election and post-election lawsuits regarding the validity of Measure M.

A. ROLL CALL, POSTING OF AGENDA, FLAG SALUTE

B. REPORTS

1. Public Works Department

SUBJECT: Proposed Speed Hump Program. (15/15/15)

RECOMMENDATION: That the Public Works and Transportation Committee receive and comment on the proposed speed hump program and recommend the proposed program be presented to the City Council for their comments and approval.

Please click the following link to view the required Measure M pre-recorded presentation video: <https://youtu.be/1GoSCy8NUUM>

Contact: Michael Wolfe, (805) 385-8055

C. ITEMS FOR FUTURE AGENDAS

D. ADJOURNMENT



PUBLIC WORKS AND TRANSPORTATION COMMITTEE AGENDA REPORT

REPORTS AGENDA ITEM NO. B.1

DATE: September 17, 2022

TO: Public Works and Transportation Committee

FROM: Michael Wolfe, Public Works Director, (805) 385-8055, michael.wolfe@oxnard.org

SUBJECT: Proposed Speed Hump Program. (15/15/15)

RECOMMENDATION

That the Public Works and Transportation Committee receive and comment on the proposed speed hump program and recommend the proposed program be presented to the City Council for their comments and approval.

Please click the following link to view the required Measure M pre-recorded presentation video: <https://youtu.be/1GoSCy8NUUM>

BACKGROUND

The City receives numerous inquiries about speeding on public streets. These inquiries are usually accompanied by requests for stop signs and/or speed humps. Staff analyzes each request for stop signs and more often than not, the criteria set forth by the State of California Manual on Uniform Traffic Control Devices (CMUTCD) are not satisfied. Studies have shown that stop signs do not reduce speeds between intersections. In fact, CMUTCD strongly recommends against the use of stop signs to control speed and urges their use only as a tool to assign right-of-way at intersections. The interest in speed humps has increased in the past five years due to their increased use by agencies in the State and the exposure given these speed humps by the media. The overwhelming majority of requests involve residential streets. The City of Oxnard does not currently have a program which addresses the use and installation of speed humps. A program will help define the issue, provide a systematic and engineering approach for review, establish priorities and funding needs, and provide a means for installation of speed humps.

The City received roughly 200 speeding complaints, mainly on residential streets, in a five-year period (from August 1, 2017 to July 31, 2022). When complaints of speeding are reported on a street, staff attempt to address the issue by conventional means (i.e., additional signing and/or roadway striping). If these methods fail to mitigate the issue, or if these methods cannot be applied, selective speed enforcement is requested and conducted by the Oxnard Police Department.

It should be noted that a speed hump program was in place in Oxnard as early as 2005, based upon research performed by current staff. It is unclear of the overall program goals, procedures, or objectives because of the lack of information archived for the current staff to review. Old documents indicate that several speed humps were installed as a result of that program. Furthermore, archived documents indicate that staff understood that the program was halted in 2012 due to concerns with emergency response times expressed by the Fire Department. Additionally, documentation was found that a program was presented to the Transportation

Policy Committee in 2017 and 2018 but it was never adopted by the City Council.

DISCUSSION

Speed Humps vs. Speed Bumps:

Speed humps are suitable for streets and are typically shaped as parabolic, sinusoidal or circular and are 3 to 4 inches high. Humps create a gentle vehicle rocking motion that may cause some driver discomfort, which results in drivers slowing to approximately 15 MPH at the hump. If traversed at higher speeds, humps cause a jarring effect on the vehicle and its occupants. The primary purpose of speed humps is to lower speeds on residential streets.

Speed bumps, on the other hand, are commonly found in parking lots on private property and are typically abrupt and up to 6 inches high. Bumps cause significant discomfort at typical residential speeds. At speeds above 25 mph, bumps have less effect on vehicles with non-rigid vehicle suspensions which absorb the impact before the rest of the vehicle can react. For vehicles with rigid suspensions, such as trucks, buses, emergency vehicles (fire engines, ambulances, police cars) and motorcycles, bicycles, etc. the risk of damage and/or injury increases with bumps.

The Institute of Transportation Engineers (ITE) report and experience of other agencies determined that when properly designed and applied, speed humps have been found to be safe, effective devices when all other means have failed. It should be stressed that speed humps should only be considered when more conventional methods have failed to reduce speeds and increase safety (i.e., 3-Es: Education, Engineering, Enforcement).

Furthermore, advancements in technology have developed speed cushions and speed tables, which are specialized speed humps. The configuration of the speed cushions allow for emergency vehicles, such as fire apparatus with wide-axle set-ups, to straddle the vertical portions of a speed hump (see attached image). The speed cushion configuration results in less delay to emergency vehicles. Furthermore, in the correct situation, speed tables are a tool that can be deployed that allows for emergency vehicles to transition without a major reduction in speed (see attached image).

Effectiveness of Speed Humps:

Speed humps have been shown to reduce the travel speed of vehicles on residential streets. According to data provided by the ITE, studies indicate that the “85th Percentile Speed” decreased by six (6) to seven (7) miles per hour after speed humps were installed. However, travel speeds may also increase up to one (1) mile per hour between the speed humps.

Advantages of Speed Humps

- Reduced vehicular speeds
- Reduced certain type of collisions
- Possible reduction in cut-through traffic

Disadvantages of Speed Humps

- Increased emergency response time*
- Increased noise
- Impact to private vehicles (maintenance cost increase)
- Impact to public vehicles like trash trucks and fire trucks (maintenance cost increase)
- Increased speed between speed humps
- Impact to parking, drainage, and street sweeping

- Impacts to users of vehicles with disabilities (e.g. spine related disabilities)
- Reports of increased air emissions and increased gas consumption
- High capital cost
- Requires long term funding for routine maintenance
- Residents living on the block will be the ones driving over the speed humps most frequently
- Installation may require placement of the speed hump and/or warning signs in front of someone's home

*Input from the Fire Marshall: there are response delay concerns. Namely, (1) modern fire growth curve doubles every 60 seconds; (2) the survival rate for cardiac arrest is estimated to be around 50% when CPR is administered within 3–5 min. However, this survival decreases by 7–10% with each minute that defibrillation is delayed; and (3) speed cushions could be used to help minimize delays with large fire vehicles but not with ambulances or smaller response vehicles.

*Input from the Police Department: there is potential delay in emergency response, however anticipate minimal impact with police vehicles. PD is supportive of speed humps as effective traffic calming devices, where data supports their installation. PD believes that a systematic process to request speed humps will reduce complaints coming to PD to assist with analysis. Also, PD believes that speed humps would reduce time spent doing directed enforcement at the problem location, allowing police resources to focus on other areas.

PROPOSED SPEED HUMP PROGRAM

Request Process:

- Applications for speed humps will be accepted from any resident, neighborhood council, school, or other entity whose property is abutting the requested street segment.
- If the street meets the minimum eligibility criteria, the Traffic Engineering Division will perform an in-depth traffic study of the area in question prior to making a determination. This process can take approximately two (2) months to complete. Once a determination is made by the traffic engineering division, the Applicant will be notified of the outcome by mail.
- If approved to proceed, a map showing the proposed speed hump location will be mailed to the applicant along with Petition forms to be signed by designated area residents indicating support or opposition of the speed hump. It is the responsibility of the Applicant to collect the signatures by the date indicated on the response from the City.
- Once the required signatures have been collected, a minimum of 67% (two thirds) of the designated residents (either owner or tenant), the Applicant shall then return the collected Petition Forms to the City for review and verification.
- Completed applications will be reviewed and ranked according to the Criteria and Ranking System listed below.

Eligibility Criteria:

Traffic Engineering staff will conduct the necessary traffic engineering studies and determine the street's eligibility for speed hump installation based on the following criteria:

Minimum Criteria:

- The street must be designated as a local road or a “residence district” as defined in the California Vehicle Code and may not be designated as a Major Arterial, an Arterial, a Minor Arterial, or a Collector.
- The street may not be designated an emergency service travel route or otherwise deemed ineligible by the Fire Department.

- c. The street may not be designated as a bus or commercial vehicle truck route.
- d. The minimum length of the street or street segment under consideration for speed humps shall not be less than one thousand (1,000) feet, which is uninterrupted by stop signs or any other traffic control device. Speed humps will not be considered for installation on cul-de-sacs unless they have an uninterrupted street length of 1,000 feet or more.
- e. The local street or residence district must have a paved width of forty-four (44) feet or less and have no more than two (2) traffic lanes.
- f. The street must have an established speed zone of either twenty-five (25) or thirty (30) MPH; any street with an established speed zone of thirty-five (35) MPH or greater will not be considered. Established speed zones of thirty-five (35) MPH or greater serve as a Collector designation and will not be considered.

Analysis Criteria:

- g. The sum of traffic volumes on the local street or residence district for both directions must be more than five hundred (500), but less than two thousand (2,000) vehicles per day.
- h. The measured 85th percentile from the twenty-four (24) hour speed profile must exceed the established posted speed limit by nine (9) miles per hour or more; OR there must be five (5) or more reported speed-related traffic collisions within the subject street segment during the last twelve (12) months of recorded data.

Ranking Criteria:

The City proposes to utilize a ranking system to determine priority based on need and resources available. The ranking will be separated into the six City Council Districts. Meaning, each Council District will have its own ranked list. The table below provides the breakdown of the scoring system. A street segment's prioritization score is determined by summing the following factors:

Item	Points
1. Traffic Speed	Percentage of vehicles traveling at or more than ten (10) mph over the posted speed limit on the proposed project street divided by two (2).
2. Traffic Volume	Average daily traffic volume on the proposed project street divided by one hundred (100).
3. Traffic Collisions	Two (2) points per collision that likely could have been resolved by the speed hump, based on collision records for the past three (3) consecutive years.
4. Schools	Five (5) points for each private or public elementary, middle, or high school within the area benefited by the proposed speed hump.
5. Other	a) Five (5) points if a street has a sidewalk on only one side. b) Twenty (20) points if a street does not have a sidewalk on either side. c). Three (3) points for each pedestrian generator or attractor (such as a public park, public swimming pool, publicly accessible green way, etc.) within the area benefited by the proposed speed hump. d) One (1) point for each bus stop within the area. e) Five (5) points for each designated school crossing within the area.

	f) Ten (10) points for each yearly funding cycle period that a project remains on the prioritized list without being ranked high enough for funding (max of three funding cycles).
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The street segment with the higher-ranking score will be considered to have the higher priority, by Council District. The street with the earliest application date will have the higher priority among streets with the same ranking score.

Once a request is complete, fully processed, and placed on the list to be funded, locations that do not receive funding in the initial fiscal year, will automatically be considered in the subsequent funding cycles, for a maximum of three (3) additional fiscal years (three funding cycles). As noted above, additional points are added to completed requests should they not receive funding right away. If the funding is still not approved after the three (3) year reconsideration period, the request will expire. A new written application may be submitted subject to the steps in the speed hump program in effect at the time of the application. Each application requires a separate and independent evidence of support petition.

STRATEGIC PRIORITIES

This agenda item supports the Infrastructure and Natural Resources strategy. The purpose of the Infrastructure and Natural Resources strategy is to preserve and improve our roads, utilities, parks, trees, water supply and natural resources through effective planning, prioritization, and an equitable and efficient use of available funding.

FINANCIAL IMPACT

The estimated cost for a speed study per location is \$500. Estimated cost of design and installation of speed hump is approximately \$25,000 (assuming 3-humps per segment). Maintenance cost is estimated at \$500 per year per location for signs and markings.

No funding has been established for a speed hump program for Fiscal Year 2022-23. However, staff does anticipate that if the City Council approves the proposed speed hump program, staff will be requesting \$50,000 per City Council District (for a total of \$300,000 each year) each new Fiscal Year. This will allow for the installation of speed humps at the top two ranked locations in each Council District each Fiscal Year.

Please note that some agencies allow private funding for speed humps but City staff is not recommending that process for Oxnard.

Prepared by: Tatiana Arnaout, City Engineer

ATTACHMENTS

- 1. Speed Table
- 2. Speed Cushion
- 3. Presentation

SPEED TABLE



SPEED CUSHION



Proposed Speed Hump Program

Public Works & Transportation Committee
September 17, 2022

Michael L. Wolfe, P. E.
Public Works Director

That the Public Works and Transportation Committee receive and comment on the proposed speed hump program and recommend the proposed program be presented to the City Council for their comments and approval.

Why consider a Speed Hump Program?

- One of many traffic calming tools
- Speeding and/or cut-through traffic on residential streets
- Significant amount of requests (Roughly 200 over 5-year period)
- Define an engineering approach for implementation
- Establish priorities

Considered only after other options (enforcement and other traffic calming tools) have been reviewed and implemented

What can they do?

- Act as devices in reducing speeding in residential neighborhoods
- Modify cut-through traffic patterns

What can't they do?

- Should not be placed on high volume roads (arterial, collectors)
- Humps have to be used as set (usually 3) to be effective
- Humps should not be installed on streets where there are known drainage/flooding issues



PROS:

- Reduced vehicular speeds
- Reduced certain type of collisions
- Reduction in cut-through traffic

CONS

- Increased emergency response time
- Increased noise
- Increased speed between humps
- Increase \$ for maintenance public/private vehicles
- Impact to drainage, parking, and street sweeping
- Residents living on the block will be the ones driving over the speed humps most frequently
- May require placement of the speed hump and/or warning signs in front of someone's home
- Social/economic - fuel consumption; ADA impacts
- May move the "problem" elsewhere
- High cost for installation
- Long term and routine maintenance \$

Process - City staff and neighborhoods

- **Eligibility Criteria -**

- Minimum:**

- Traffic volume between 500 and 2,000 vehicles per day
 - Residential street with posted speed limit of 25 mph or 30 mph
 - Street shall be a minimum of 1,000 ft in length.

- Analysis**

- 85% Speed must be 9 mph over the posted speed limit or 5 or more collisions resulted from vehicular speeds in a 12-month period

- **Review/Approval by Fire/PD**

Continued:

- **Neighborhood Petition Signed by 2/3rds**
 - Designated residents (owners or tenant)
- **Ranking/Prioritization**
 - Defined point system
 - Council Districts
 - Valid for three years
 - Will be consider in three funding cycles
 - Ranking points added each cycle not funded
 - Will expire after three funding cycles
 - Require new written application/petition

Estimated Cost:

- Speed Studies: \$500* per location
- Design and Construction: \$25,000* including signs/markings
 - 3 speed humps per segment on average
- Maintenance: \$500*/year/location

General Fund:

- Fund by Council District (\$50,000* per District)
- One or two locations per District per year
- \$300,000*

Private Funding (not recommended by Staff):

- Exists in other agencies
- Can create equity issues

*2022 Costs

- **City Departments**
 - Police
 - Fire
 - Streets Maintenance
 - Environmental Resources
 - City Attorney's Office
- **Public Works and Transportation Committee**
 - **September 17, 2022**
- **City Council Meeting**
 - **TBD (anticipate this calendar year)**

Fire Department:

- Response delay concerns
- Modern fire growth curve doubles every 60 seconds
- The survival rate for cardiac arrest is estimated to be around 50% when CPR is administered within 3–5 min. However, this survival decreases by 7–10% with each minute that defibrillation is delayed
- Speed cushions could be used to help minimize delays with large fire vehicles but not with ambulances or smaller response vehicles

Police Department:

- Potential delay in emergency response, however anticipate minimal impact with police vehicles
- Support speed humps as effective traffic calming devices where data supports their installation
- The systematic process to request speed humps reduces complaints coming to PD to assist with analysis
- Speed humps would reduce time spent doing directed enforcement at the problem location, allowing police resources to focus on other areas



QUESTIONS