

INTEROFFICE MEMO

TO: CRAIG STECKER, FREMONT POLICE CHIEF

FROM: GEORGE RAWSON, PUBLIC SAFETY DIRECTOR

DATE: September 14, 2007

REF: Speed Humps

Craig – the below information is the result of my initial research regarding the feasibility of installing speed humps on public streets in Carmel. Information was collected from other California cities and traffic engineer Malcolm Knisely. The cities of Marysville, Grass Valley, Morgan Hill and Pleasanton have utilized speed humps and report no significant problems to date. The below discussion points are offered as considerations for future policy direction.

LEGAL: Local agencies using recognized and accepted traffic control devices have a degree of immunity when installing such devices in accordance to accepted uniform standards. This would not be the case when installing rubberized speed humps. Rubberized speed humps are not recognized by the California Vehicle Code as “official traffic control devices.” Installing rubberized speed humps raises potential for liability in the event a traffic collision occurs and the collision is in some way is associated with a speed hump

There is one style of speed hump design that is approved by the California Manual of Traffic Control Devices. The standards are as follows: asphalt or concrete material, 3.5 inches in height, 12 feet wide (the distance oncoming cars would diver over), and can extend in length from pavement edge to edge. A striping and sign plan must accompany the installing of the hump. Installing a hump of this design in conjunction with a traffic calming policy would not pose liability risks as described with the rubberized hump.

POLICY: Notwithstanding the legal risks, if the city desires to institute a speed hump program, a city wide policy is recommended that establishes criteria or “warrants” for use of portable or permanent speed humps. There should be objective data and reasoning that justifies such devices are an appropriate response for the location in question. Factors to consider include volume of traffic, speed as it relates to the 85th percentile, and accident history. Failure to establish a policy will create confusion and dissatisfaction from other city residents who are unsuccessful in getting a speed hump installed on their street.

EQUIPMENT & STAFF TIME: Depending on the type of speed hump device acquired it could take a 3 person crew one full day to install the system. Holes have to be drilled in the asphalt and bolts are used to anchor the humps. Removing these devices would involve shearing the bolts and due to the labor and time involved it would not make sense to transfer the speed humps from one street to another.

EMERGENCY VEHICLE RESPONSE: Some cities opted to install speed humps that would not hamper fire truck responses. These systems were designed to allow for gaps that were matched to the width of the fire truck tires. Installing such as system allowed fire trucks the ability to respond unimpeded by the humps.

COSTS: There are a variety of speed hump configurations to choose from. Portable rubberized speed humps can be customized by size, length, gradient, and height. Depending on style and size, the costs can range from \$70 to \$225 four foot sections. Attachment "A" portrays a photo, specifications, and price of a typical section of a rubberized speed hump. For Dolores Street (29 feet wide), the costs for purchasing enough interlocking segments to extend roadway edge to edge are estimated at \$ 2,200. Additional costs for hardware, signage, and striping are estimated at \$800, which does not include public work's time for labor.

Some communities include as a part of their traffic calming policy a requirement that residents bear the costs for installing and removing temporary speed humps. It is recommended Carmel include a similar requirement if such a program were implemented.

Attachments "B", "C", and "D" offer photographs of what one city used for their speed hump installation

SUMMARY: The liability for installing speed humps is a serious concern conveyed by the traffic engineer. Other cities that have installed speed humps did not report any issues relating to liability. Ultimately, if the city intends to proceed with approving speed humps, a policy will need to be developed for guidance. In the case of Dolores Street, an alternative to speed humps is a "dip" that could also be used to assist with drainage.