

CITY OF MYRTLE BEACH TRAFFIC CALMING CONSTRUCTION REQUEST POLICY

Purpose:

Pedestrian safety, excessive speeding, and cut-through traffic are common concerns within residential neighborhoods. In order to maintain a pleasant living environment and ensure the safety of children and residents, traffic calming measures may be taken to alter driver behavior by making speeding more difficult and lessening one's ability to cut through while preserving street access.

The purpose of the traffic calming policy is to:

- Improve neighborhood livability by reducing the negative impact of vehicular traffic on residential streets,
- Promote safe and pleasant conditions for non-motorized street users (i.e. pedestrians, children, bicyclists) while maintaining the safe movement of local residential vehicular traffic,
- Encourage citizen involvement in all phases of neighborhood traffic management activities, and
- Prioritize traffic calming projects through the efficient use of city resources.

Measures Taken:

The most widely accepted method by state and local agencies is to set speed limits at the nearest 5 miles per hour (MPH) increment to the 85th percentile speed – the speed at which 85 percent of all traffic is travelling at or below. Studies have shown crash rates are lowest around the 85th percentile speed. Since speed limits are generally set using the 85th percentile speed, it is *expected* that 15 percent of the vehicles will exceed the speed limit on a regular basis. Because it is extremely rare and generally counterproductive to cite drivers operating slightly over the speed limit, if the 85th percentile speed falls within a range of 25.0 to 34.9 MPH, the street is not considered to have a speeding problem since the speed is reasonably close to the posted speed limit on residential streets. However, once the 85th percentile speed is greater than 35 MPH, the situation is considered a speeding problem. Additionally, flagrant violators (i.e. drivers operating at very high speeds) pose the greatest risk and are generally to focus of police enforcement.

Studies have shown that in most cases, the majority of speeders on residential streets are residents of the neighborhood. Neighborhoods residents should discuss speeding concerns with one other and encourage each other to slow down. Neighborhoods should organize and designate a point-of-contact to request police enforcement during community watch meetings or by contacting the Myrtle Beach Police Department (MBPD). Enforcement measures may include increased patrol and/or deployment of

portable radar units. Should police enforcement not satisfactorily alter driving behavior, then a traffic speed study and/or traffic calming street treatment(s) may be considered.

To qualify for traffic calming street treatment, the street must meet following conditions:

1. Be within the city limits of the City of Myrtle Beach
2. Be a city-owned local residential street that is open to the public.¹
3. Be a two lane roadway (may have turn lanes and may have parking).
4. Have a posted speed limit of 25 MPH or less for local residential streets
5. Have speeding conditions with the 85th percentile speed 10 MPH greater than posted limit²
6. Have an Annual Average Daily Traffic (AADT) volume greater than 1000 vehicles.

Traffic calming involves changes in street alignment and other physical measures to reduce the negative effects of motor vehicle use in an effort to alter driver behavior and improve conditions for non-motorized street users. There are many types of traffic calming street treatments that can be implemented, including speed humps, traffic circles, raised crosswalks, roundabouts, speed-monitoring devices, traffic diverters, and medians or traffic islands.

The Public Works Department determines the best traffic calming solution after careful review of street conditions and safety considerations of the area that could potentially be affected by implementation of a traffic calming measure. At a minimum, the affected area includes all streets for which traffic calming is proposed, all streets that are only accessible via these streets, and all streets that are likely to absorb significant levels of traffic diverted as part of traffic calming measures.

The data to be compiled throughout the affected area by the Public Works Department may include some or all of the following:

- Roadway functional classification
- Speed – posted speed limit, average speed and 85th percentile speed in each direction
- Vehicle volume – daily and peak hours
- Graphical representation of all traffic control devices in affected area, including signs, markings, and signals

¹ On a limited case-by-case basis, certain neighborhood collector streets with speed limits of 30 MPH or less that have characteristics of local residential streets may also qualify for traffic calming measures.

² Speeding Condition: 85th percentile speed of 35 MPH or greater on a 25 MPH local residential street
85th percentile speed of 40 MPH or greater on a 30 MPH neighborhood collector street.

- Description of physical characteristics of roadways in affected area, including width, pavement condition, sidewalks, crosswalks, bicycle facilities, curb and gutter versus shoulder
- Adjacent arterial streets – are mobility or safety problems on an arterial street contributing to the perceived local street problem or issue?
- Crash and Traffic Stop data – recent by type
- Parking – location and use
- Pedestrian activity – volume and origin-destination patterns
- Bicyclist activity – volume and origin-destination patterns
- Designated emergency response routes
- Transit routes and bus stops
- Current character of the area including property zoning and locations of schools, parks, senior housing, medical services, and other unique trip generators
- Description of petition area, with map

At the heart of any successful Traffic Calming Policy is a structured process and strong community support.

Review Process:

The following procedures generally describe the process by which traffic calming devices are considered for installation by the City:

1. A citizen may initiate a request for a traffic speed study and/or traffic calming device by writing the City Manager and identifying the specific traffic concern(s) the traffic speed study and/or traffic calming device is expected to address.
2. The City Manager will direct the Public Works Department to evaluate the request and to specifically determine if the traffic speed study and/or installation of a traffic calming device(s) will address the citizens' traffic concern(s) **within 14 days**. Additionally, the evaluation will include a determination by the Public Works Department if the street under consideration qualifies for traffic calming device installation.

The concerns and viewpoints of transit/delivery providers and several city services will be heard through collaboration with Public Works Department representatives: Solid Waste Services, Street Maintenance, Myrtle Beach Fire Department, Myrtle Beach Police Department, Emergency Services, Transit

Agencies, Horry County Public School District, and Delivery Services/Postal Carriers.

3. If it is determined that the street qualifies for traffic calming device and the specific traffic concern(s) will be adequately addressed with the installation of a traffic calming device and/or traffic speed study, then a petition drive is authorized.

4. Petition requirements:

- Only petition forms provided by the Public Works Department or exact duplicates may be used.
- The citizen initiating the request will be the designated point-of-contact to organize neighbors and will receive the petition forms and information from the Public Works Department. The petition must be signed by at least 75 % of the people living on the street and on any streets that **only** have access by way of the street under consideration. Additional areas may be added to the signature target area if the City determines that sufficient traffic from the area will be impacted. Only one signature per residence will be counted. Additionally, 100 % of all commercial, retail, and institutional facilities having access **only** by the street under consideration must sign the petition.
- Once initiated, the petition process must be completed **within 90 days**. The completed petition forms should be sent to:

Director of Public Works
City of Myrtle Beach
P. O. Box 2468
Myrtle Beach, S. C. 29578

- After verifying the validity of the completed petition, the following activities will occur **within 90 days**:
 - City will make a thorough attempt to notify every household or other entity in the petition area of the pending recommendation to install a traffic calming device.
 - The Public Works Department will conduct a traffic speed study should it be deemed necessary and/or provide a technical review of the traffic calming device request and an initial project estimate. An engineer's probable cost to construct estimate will be obtained once the traffic calming device has been designed.
 - The Public Works Department will include the traffic calming device request on an Annual Traffic Project Priority List.

- Procedure for removing a traffic calming device. If the residents of a street wish to have a traffic calming device removed, the same petition process required for the installation of a traffic calming device should be followed. If the residents of the street initiated the petition process that initially led to the installation of the traffic calming device, the cost for removal is expected to be borne by the residents of the street.
5. City Council Consideration. Once the petition is determined to meet the requirements of this section of the policy and the Public Works Department has determined the best traffic-related solution after careful review of street conditions and safety considerations of the area, the Public Works Department will submit the Annual Traffic Project Priority List to City Council for their consideration. Traffic project installations may be approved by motion and financially supported within the Capital Improvement Plan (CIP).
 6. Traffic calming device installation projects will be included as a part of the Public Works Department's Annual Capital Improvements Program. The timing of traffic calming device installation will be subject to available resources. When the actual date of installation is determined, the designated point-of-contact person will be notified in writing.

Implementation Guidance:

The US Traffic Calming Manual (2009) and SCDOT Traffic Calming Guidelines (2006) serves to guide specific criteria for each type of traffic calming device presented below. The Manual for Uniform Traffic Control Devices (MUTCD) shall serve to guide traffic control devices, such as signs, signals, and pavement markings.

The installation of traffic calming devices that reduce the total two-way travel area to less than 20-feet are not eligible for approval. In addition, if the proposed physical traffic calming measure compromises roadway safety based upon limited sight distance, severe grade change, or other engineering judgement, the measure is not eligible for approval. The installation of traffic calming devices must insure positive drainage flow.

This section will be amended to include criteria for various devices as they are developed or as guidelines are updated.

Vertical Measures:

1. SPEED HUMPS – The following criteria will be considered when recommending the use of a speed hump:

- Roadway Functional Classification – local residential street and neighborhood collector.
 - Annual Average Daily Traffic (AADT) volumes should be greater than 1,000 and less than 4,000 vehicles.
 - Shall not be located within a horizontal curve or within 150 feet of its approach.
 - Shall not be located on a bus or emergency response route.
2. RAISED CROSSWALK – The following criteria will be considered when recommending the use of a raised crosswalk:
- Roadway Functional Classification - local residential street and neighborhood collector.
 - Maximum of two lanes of traffic in each direction of travel.
 - Considered use within urban areas of high pedestrian volume, school areas, or business districts.
 - Annual Average Daily Traffic (AADT) volumes should be
 - greater than 1,000 and less than 4,000 vehicles within residential area.
 - greater than 4,000 and less than 6,000 vehicles within urban area.
 - Speed limit less than or equal to 30 MPH.
 - Within urban area applications:
 - Horizontal curve of 300-foot radius or more.
 - Vertical curve with adequate stopping sight distance.
 - Grade of 8% or less.
 - Signal or stop control spacing greater than 1280-feet.
3. RAISED INTERSECTION – The following criteria will be considered when recommending the use of a raised intersection:
- Roadway Functional Classification - local residential street and neighborhood collector.
 - Maximum of two lanes of traffic in each direction of travel.
 - Considered use within urban areas of high pedestrian volume, school areas, or business districts.
 - Annual Average Daily Traffic (AADT) volumes should be
 - greater than 1,000 and less than 4,000 vehicles within residential area.
 - greater than 4,000 and less than 6,000 vehicles within urban area.
 - Speed limit less than or equal to 30 MPH.
 - Within urban area applications:
 - Horizontal curve of 300-foot radius or more.
 - Vertical curve with adequate stopping sight distance.

- Grade of 8% or less.
- Signal or stop control spacing greater than 1,280-feet.

Horizontal Measures:

4. TRAFFIC CIRCLES – The following criteria will be considered when recommending the use of a traffic circle:
 - Roadway Functional Classification – local residential street
 - Daily Entering Volume less than 7,500 vehicles
 - Speed limit less than or equal to 35 MPH
 - Shall not be located on a bus or emergency response route
 - On bike routes, design with clear bike accommodations
5. ROUNDABOUT (Single Lane) – The following criteria will be considered when recommending the use of a roundabout:
 - Roadway Functional Classification – neighborhood collector and arterials, not applicable for local residential streets
 - Daily Entering Volume less than 18,000 vehicles
 - Speed limit less than or equal to 45 MPH
 - Desired design radius greater than 50-feet to accommodate bus and emergency response routes
 - On bike routes, design with clear bike accommodations

Narrowing Measures:

6. CENTER ISLAND NARROWING/PEDESTRIAN REFUGE – The following criteria will be considered when recommending the use of center island narrowing/pedestrian refuge:
 - Roadway Functional Classification – local residential streets, neighborhood collector, and arterials.
 - Annual Average Daily Traffic (AADT) for the following:
 - greater than 6,000 and less than 20,000 vehicles for arterials.
 - greater than 4,000 and less than 6,000 vehicles within urban area.
 - greater than 1000 and less than 4,000 vehicles within residential area.
 - Speed limit less than or equal to 35 MPH.
 - On bike routes, design with clear bike accommodations.