

CHATHAM COUNTY DEPARTMENT OF ENGINEERING
NEIGHBORHOOD TRAFFIC CALMING POLICY

MISSION

The Chatham County Department of Engineering (hereinafter referred to as Department) routinely receives requests for the installation of speed bumps/humps to reduce the volume and speeds of vehicles traveling through residential neighborhoods. Chatham County **does not** install speed bumps or speed humps because they are an unanticipated hazard in the roadway that can delay emergency response and impede drainage. In addition, they create noise from cars bottoming out and from vehicles braking and accelerating, which reduces the quality of life of residents living adjacent to these features. However, there are other alterations that can be made to the roadway to help slow traffic traveling through residential neighborhoods and to deter cut through traffic.

This policy shall establish a set of standard criteria that will be used to determine the applicability of the traffic calming features discussed below. ITE defines traffic calming as “The combination of mainly physical measures that reduce the negative effects of motor vehicle use, alter driver behavior, and improve conditions for non-motorized street users.” When these features are applied to neighborhood streets, the goals are as follows:

- Reduce the speed of vehicles in residential areas for 85% of vehicles to a safe legal speed.
- Reduce the volume of cut-through traffic.
- Make the streets safer, in general
- Make the streets safer for pedestrians and cyclists
- Improve the quality of life for the County’s residents

The Department will consider the following types of features, either singularly or in combination within residential neighborhoods to reduce cut through traffic or reduce vehicular speeds:

- Striping/Pavement Markings/Signage
- Roundabouts/Mini-roundabouts/Intersection Re-alignment
- Geometric Measures
 - Lane Narrowing/Intersection Throating
 - Chicanes/Diverters/Partial Diverters
 - Forced Turn Island/Turn Movement Restrictions
- Electronic Radar Speed Signs (*Paid for by HOA/Residents)
- Sidewalks/Bike Lanes

APPLICATION AND CRITERIA

This Neighborhood Traffic Calming Policy (NTCP) shall apply to local residential streets with a posted speed limit of 25 MPH. According to the Federal Highway Administration, local roads have the following characteristics:

URBAN	RURAL
-Provide direct access to adjacent land	-Serve primarily to provide access to adjacent land
-Provide access to higher systems	-Provide service to travel over short distances as compared to higher classification categories
-Carry no through traffic movement	-Constitute the mileage not classified as part of the Arterial and Collector systems

A residential minor collector street with predominantly residential land uses and a posted speed limit no greater than 30 MPH may be considered on a case by case basis at the discretion of the Director of Engineering. No road with an ADT over 4,000 vehicles will be considered for traffic calming installation.

Any road under consideration for traffic calming must have a minimum length of 1,320 feet (0.25 miles).

NEIGHBORHOOD TRAFFIC CALMING PROCESS

In order to initiate the Neighborhood Traffic Calming process, a resident or representative of a Home Owners Association (HOA) must provide a completed application (See Appendix A) to the Department to investigate traffic calming measures. The request must include the road or roads to be included in the request and the justification for making the request (speeding, cut-through traffic, etc.). An initial petition showing a minimum of 60% of residents living on the street or streets approve of the investigation must accompany the initial request.

The Department will review the request and see if the road or roads requested meet the preliminary criteria established. If the preliminary criteria established are met, the Director of Engineering will establish the study area and the Department will schedule a speed study to be completed for the roads, as well as an investigation of any traffic accident reports over the past 5 years. For the purposes of this policy, a road will be deemed to have a traffic speeding problem if the 85th percentile speed is at least 10 miles per hour over the posted speed limit.

If the results of the speed study indicate the traffic speeds do not meet the preliminary criteria, the applicant will be informed in writing and the Department will continue to monitor the area. If the results indicate that the traffic speeds and volumes meet preliminary criteria, the applicant will be notified and preliminary discussion on possible options will begin.

The Director of Engineering may decide to start the process with an education program. This program may consist of letters, pamphlets or neighborhood meetings to identify the likely causes of speeding issues and possible steps individual residents can take themselves to reduce the average speeds to improve safety in the area. The Director of Engineering may also request the Chatham County Police Department to increase enforcement for the problem area to see if this reduces the 85th percentile speeds.

Utilizing the results of the speed study, on-site investigation and the study area established by the Director of Engineering, staff will develop a plan of action for implementing traffic calming measures that meet the goals of the NTCP. A tiered plan of action will be developed, with the goal of utilizing the least expensive and least intrusive options available first. The plan will be presented to the neighborhood for comments prior to implementation. A final petition will be required from 75% of the residents living on each impacted road showing approval for the plan before it is implemented.

After the traffic calming plan is implemented, staff will conduct another speed study to determine the effectiveness of the measures implemented. Based on the results of the study, additional measures may be considered and additional study may be conducted at the discretion of the Director of Engineering. It is important to remember that implementing traffic calming measures is an iterative process, and what works well in one neighborhood may not necessarily work well in another neighborhood.

PRIORITIZING TRAFFIC CALMING PROJECTS

In order to determine project priority, the following Project Ranking System is established. If a traffic calming project is determined to be feasible based on the criteria above, it will be given a funding prioritization based on the criteria below. Those projects with the highest total points will be given priority of projects with lesser scores.

**NEIGHBORHOOD TRAFFIC CALMING
PROJECT RANKING SYSTEM**

Criteria	Points Possible	Basis for Assigning Points
Speed	0 to 30	Extent by which 85th percentile speed exceeds posted speed limit; 2 points assigned for every 1 mph.
Volume	0 to 25	Average daily traffic volumes (1 point assigned for every 100 vehicles).
Crashes	0 to 10	1 point for every speed related crash over last 5 years.
Schools	0 to 10	5 points assigned for each school crossing on the project street.
Right of Way Acquisition Required	0 to 5	0 points if right of way is required, 5 points if no right of way acquisition is required.
Pedestrian Generators	0 to 10	2 points assigned for each public facility or commercial use that generates a significant number of pedestrians.
Pedestrian Facilities	0 to 10	5 points if no continuous sidewalk on one side of the street, 10 points if missing on both sides.
Total Points Possible	100	

FUNDING OF RECOMMENDED TRAFFIC CALMING MEASURES

The Board of Commissioners shall establish Capital Improvement Project (CIP) and Special Purpose Local Option Sales Tax (SPLOST) funds to provide funding for new traffic calming installations each fiscal year. Funding shall be provided based on project prioritization as described above. Neighborhoods with projects that rank with a lower priority may be expedited if the neighborhood can provide construction funding to cover the costs of the recommended improvements.

MAINTENANCE OF TRAFFIC CALMING IMPROVEMENTS

Maintenance of the traffic calming improvements will be provided by Chatham County. In some instances, residents or HOA's may be required to provide maintenance of landscaping or other traffic calming features. This will be determined on a case by case basis by the Director of

Engineering. Maintenance responsibility will be established and codified prior to installation of a traffic calming feature.

TRAFFIC CALMING ALTERNATIVES

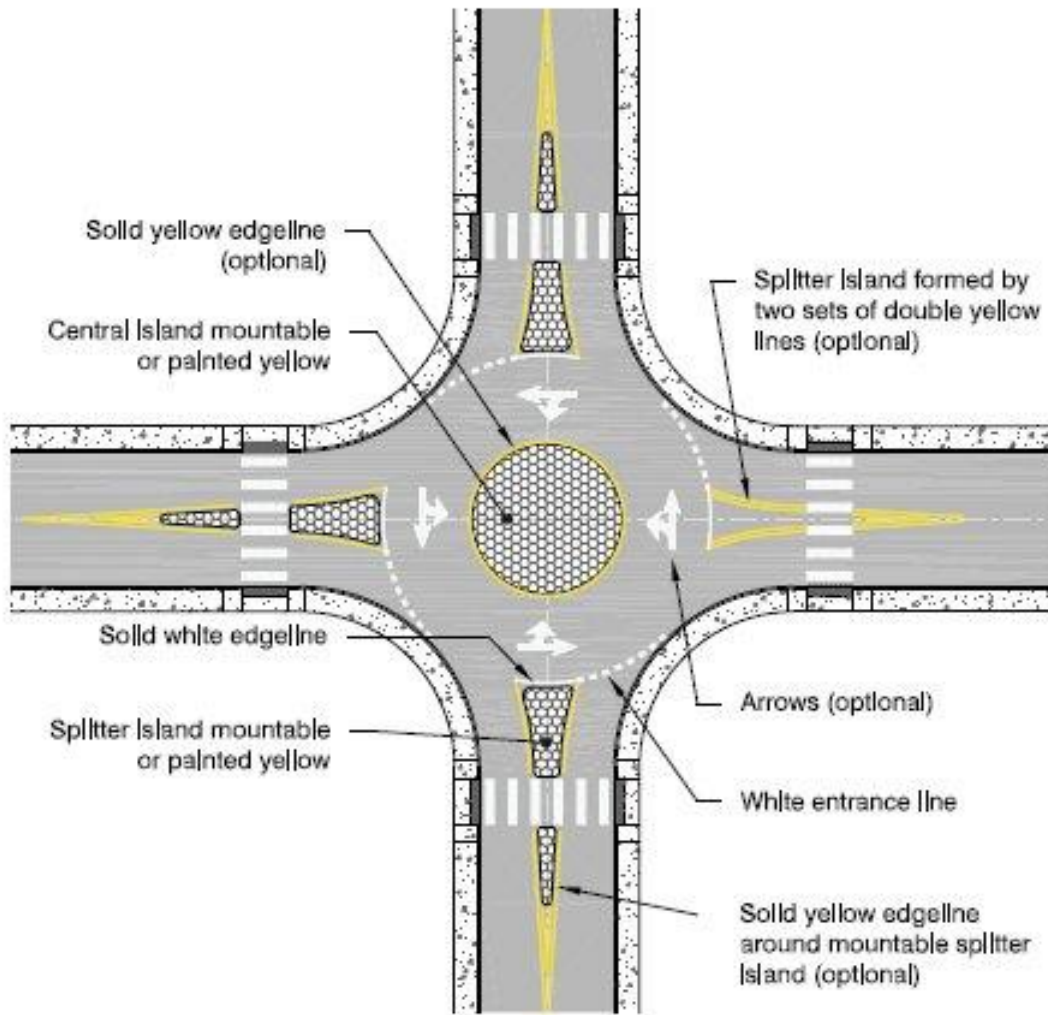
Striping/Pavement Markings/Raised Pavement Markings/Signage

Striping, pavement markings or additional street signs can be utilized as a traffic calming option that is a visible, low-cost alternative to vertical or horizontal traffic calming features. These changes provide flexibility to meet future roadway changes, do not impact drainage, can provide lane narrowing or shifts without widening existing asphalt and can be implemented quickly. Striping can also be used as a temporary measure before installation of a permanent features to determine the effectiveness and feasibility of a permanent solution prior to expenditure of funds. Below is an example of striping and pavement marking upgrades to narrow lanes and remind vehicles of the posted speed limit.



Roundabouts/Mini-Roundabouts/Intersection Re-alignment

Roundabouts and mini-roundabouts can be utilized at intersections to reduce speeds and improve safety by reducing right angle crashes. These features install a raised or striped island in the middle of an intersection that require vehicles to travel counterclockwise around the circle. Vehicles entering the roundabout are required to yield to vehicles already inside. These features are especially effective where intersection angles make sight distance difficult and side streets do not intersect the mainline at 90 degree angles.



Street Narrowing/Intersection Throating

Street narrowing or intersection throating is a physical adjustment to the width of the roadway to reduce the speeds of vehicles. They also can be utilized to reduce the width of the crossing within the roadway for pedestrians. Installation of these features slow traffic by funneling it through a narrower street opening and reduces the speed of vehicles at intersections, especially those making right turns by reducing the curb radius.



Chicanes

Chicanes are a series of three bulb-outs, typically at mid-block locations on alternating sides of the streets. Shifting of the travel lanes can reduce speeds along residential streets. The bulb-outs also provide an opportunity to add landscaping, but landscaping features must not obstruct vehicle sight distance. Utilization of this feature may reduce the availability of on-street parking.



Diverters/Partial Diverters

Diverters or partial diverters are raised, narrow islands used to separate travel lanes. They are typically installed mid-block and can be landscaped. Breaks can be provided in landscaping and curbing for pedestrians. A curb extension or bulb-out that narrows the travel lane can be used as a diverter. Minor shifts in horizontal geometry can accompany the diverter. The goal is to narrow the lane to reduce the speed which vehicles travel along the roadway.



Forced Turn Movement/Turn Restrictions

Forced turn movements and turn restrictions can be installed to reduce the conflict points at an intersection. These can include right in/right out islands or a raised median through the intersection. Signs restricting certain turn movements can also be installed, but these tend to be ignored by drivers and are difficult to enforce. Below is a picture of a raised median that requires vehicles exiting to make a right turn.



Electronic Radar Speed Signs

Electronic radar speed signs can be installed in residential neighborhoods to provide enhanced notification to vehicles of their traveling speed. These signs also have the ability to record road volumes and identify the times of day speeding occurs the most to assist with targeted enforcement. Chatham County will not pay for the installation or maintenance of these signs. However residents and HOA's will be permitted to install new signs by permit within the right of way.



Sidewalks/Bike Lanes

One of the goals of traffic calming is to provide a safe passage for non-motorized street users. The addition of sidewalks or bike lanes can help separate non-motorized road users from vehicles, improving the overall safety and operation of the road. A neighborhood or community that would like to be considered for these improvements will follow the same process established above for requesting other traffic calming features. Below are examples of a sidewalk installation on Bradley Point Road and a bike lane installed on an existing roadway.



APPENDICES

Appendix A – Application and Sample Petition Letter to Accompany Traffic Calming Request

ACKNOWLEDGEMENTS

City of Roswell, Georgia *Neighborhood Traffic Calming Program*

City of Savannah, Georgia *Traffic Calming Policy*

ASCE, *Traffic Calming - The Lumps and Bumps*

Institute of Transportation Engineers, *Traffic Calming State of Practice*

State of Pennsylvania, *Pennsylvania's Traffic Calming Handbook*

State of South Carolina, *SCDOT Traffic Calming Guidelines*

Photos and Figures obtained from Federal Highway Administration

Appendix A

Date Submitted: _____

Date Reviewed: _____

**CHATHAM COUNTY DEPARTMENT OF ENGINEERING
APPLICATION FOR TRAFFIC CALMING MEASURES**

Applicant: _____

Location: _____

Address: _____

Road Names: _____

Contact Person: _____

Telephone: _____

Email: _____

Description of the Problem: _____

General idea of requested traffic calming measures requested: _____

Verification of Eligibility (to be completed by DOE Staff)

Functional Classification: _____

of Crashes: _____

Posted Speed Limit: _____

ROW Req'd.: _____

85th Percentile Speed: _____

School Crossings: _____

Traffic Volumes (ADT): _____

Road Length: _____

Number of Parcels:
on the Roadway _____

CHATHAM COUNTY DEPARTMENT OF ENGINEERING
PETITION FOR TRAFFIC CALMING MEASURES

<i>NAME</i>	<i>ADDRESS</i>	<i>SIGNATURE</i>

*ALL THOSE SIGNING THE PETITION MUST BE THE OWNER OF THE HOME/PROPERTY
**EACH HOME/PROPERTY/PARCEL COUNTS AS ONE VOTE