

U.S. Department of Transportation  
Federal Highway Administration  
400 Seventh St., S.W.  
Washington, D.C. 20590

Refer to: HOTO-1

February 22, 2000

Mr. L.E. Allsbrook  
Traffic Engineering and Operations Manager  
City of Hampton  
Department of Public Works  
419 North Armistead Avenue  
Hampton, VA 23669

Dear Mr. Allsbrook:

We have received your January 15 letter to the former Director Michael F. Trentacoste, Office of Highway Safety, Federal Highway Administration (FHWA). The responsibilities for the Manual on Uniform Traffic Control Devices (MUTCD) and the responsibilities for approving experimentation of devices not in conformance with the MUTCD now lies with FHWA's Office of Transportation Operations. Please submit future requests to the Office of Transportation Operations (FHWA, 400 Seventh Street, SW., HOTO-1, Room 3408, Washington, DC 20590).

Thank you for transmitting your final report on the experimental pedestrian signal countdown device (IV-136(Ex)). We have reviewed the final report and your accompanying requests and offer the following comments.

We agree that the pedestrian survey data collected shows a majority believes the countdown signals are an improvement over traditional pedestrian signal heads. We were, however, surprised at the number of pedestrians who did not notice anything different at the intersection. Two age groups made comments suggesting the countdown signals need to be brighter. Is that something that you intend to pursue with the manufacturer of this device? Is the manufacturer working on a solution to the conflict between dimming features of signal controllers and their transformer?

We feel more experimentation needs to occur before proposing language to be included on pedestrian countdown devices in the Manual on Uniform Traffic Control Devices (MUTCD). In that light, we will permit you to extend this experiment for an additional 2 years, providing you revise and resubmit your evaluation plan showing your willingness to collect pedestrian and motorist behavior data detailed below in addition to revising your pedestrian survey.

1. A large number of pedestrian observations should be made (100+).
2. Data should be collected during the same time period and on the same day of the week.

3. Pedestrian data that should be collected as a minimum: (see attached sample data collection form)
  - Compliance with the pedestrian signal. When pedestrians arrive at the corner, do they cross with the WALK, the flashing DON'T WALK, or the solid DON'T WALK?
  - When pedestrians finish crossing, is it during the WALK, the flashing DON'T WALK, or the solid DON'T WALK?
  - Is the pedestrian male or female?
  - What is the pedestrian's age group? (0-17, 18-64, or 65+)
  - How was the crossing accomplished? (For Example: ran across, walked across, aborted the crossing, there was a conflict with a vehicle, or combinations of the above)
  - Note whether the observance was of a pedestrian walking alone or in a group.
  
4. Motorist data (parallel to the pedestrian crossing) that should be collected as a minimum: (see enclosed sample data collection form)
  - What was the signal display during arrival at the intersection (GREEN ARROW, CIRCULAR GREEN, YELLOW, YELLOW ARROW, RED, RED ARROW)?
  - What was the vehicle's maneuver (straight through, right turn, left turn)?
  - What was the signal display as the vehicle proceeds through the intersection (GREEN ARROW, CIRCULAR GREEN, YELLOW, YELLOW ARROW, RED, RED ARROW)?
  - Was there a conflict with a pedestrian?
  
5. The Pedestrian Survey needs to be revised as follows:
  - The age categories in the pedestrian survey should be revised to: 0-17, 18-64, or 65+.
  - Question 3 as written does not really indicate whether the pedestrian understands what the signal indications mean. We suggest you rephrase this question to get the pedestrian to explain or select the meaning of the indications (multiple choice answers). For example: What does the WALK indication mean? What does the flashing DON'T WALK mean? What does the solid DON'T WALK mean?
  - Question 4 as written also does not indicate whether the pedestrian really understands what the countdown signal means. We suggest you add an extra question: What do the numbers indicate to you?
  - We suggest you add an additional question to inquire whether the pedestrian crosses any differently with the countdown signal than with traditional pedestrian signals.

You requested to expand the experimentation to additional locations. We will look favorably on additional requests you submit to experiment with pedestrian countdown signals provided your evaluation plan for those locations includes the information listed above. Please include estimated starting and ending dates for those locations. Also, include the normal agreement regarding restoration of site and termination if safety hazards are attributable to the experimentation.

If we can be of further assistance, please contact Ms. Louisa M. Ward on 202-366-4372.

Sincerely yours,

Jeffrey A. Lindley  
Acting Director, Office of Transportation  
Operations