



# TRAFFIC AND SAFETY MANUAL

# **Traffic Control Device Application**

Revision Date: 07-01-2025

# **Purpose**

The Traffic Control Device (TCD) Application (<u>form 810071</u>) is used by local public agencies to submit a request to install and maintain a traffic control device in the right-of-way of the primary highway system.

The applicant is responsible for the operation of the device and assumes all costs for electricity, maintenance, and replacement of the traffic control device. The device shall comply with the requirements of the Manual on Uniform Traffic Control Devices (MUTCD).

## **Application Process**

The applicant should not purchase the traffic control device until after the application is approved, since changes to the proposed device may be necessary.

The applicant shall not install the traffic control device until the application is approved.

The <u>blank application</u> form is accessed via the lowa DOT forms portal. The form may be completed online or it may be printed and filled out.

The completed form is submitted via email to the DOT district office responsible for the area where the device will be installed. The point of contact at the district office is the Traffic Technician. Link to district contacts

The district office reviews the application for:

- compliance with the MUTCD,
- proper location of the device,
- appropriateness of the device,
- safety of the proposed installation, and
- overall need.

The Traffic and Safety Bureau assists in the review of the application when requested by the district office.

If the district office agrees with the request, they forward the application to the Traffic and Safety Bureau for approval by the State Traffic Engineer.

# **Need for TCD application**

### Devices that require an application (this list is not exhaustive):

- Traffic signals (new installations and changes described below in Traffic Signal Changes section)
- Flashing beacons
  - Stop beacons (red)
  - Warning beacons (yellow)
    - For intersection signs, curve signs, Be Prepared to Stop when Flashing signs, etc.
    - Programmable beacons (e.g., for use with school crossing signs)
  - Speed limit sign beacons (yellow)
    - Programmable beacons (e.g., for use with school speed limit signs)
- Rectangular rapid flashing beacons (RRFBs)
- Pedestrian hybrid beacons (PHBs)
- Flashing LED border signs (STOP signs or warning signs)
- Temporary part-time STOP signs for school crossings (e.g., roll-out or rotating STOP signs)
- Speed feedback signs
- Community wayfinding guide signs
- Water crossing signs for creeks, ditches, and rivers not listed in PPM 620.02
- Program recognition signs (e.g., Home Base Iowa Community, Bicycle Friendly Community)
- Automated enforcement equipment (refer to Section 8A-1 for additional requirements)

### Devices that do not require a TCD application:

- Street name signs
- Advance street name guide signs
- Automated license plate readers (may require a different application, refer to Section 8A-2)
- Noise camera systems (may require a different application, refer to Section 8A-2)
- Traffic monitoring systems (may require a different application, refer to Section 8A-2)

### **Traffic Signal Changes**

### Traffic signal changes that require a TCD application:

- Addition or removal of a phase
  - o Changes to left-turn phasing (e.g., protected, permissive, protected/permissive)
  - Changes to right-turn phasing (e.g., overlap)
- · Addition or removal of signal heads, or swapping to a flashing yellow arrow signal head
- Addition or removal of pedestrian heads or pushbuttons

### Traffic signal changes that do not require a TCD application:

- Timing changes
- Changes to phasing sequence (e.g., leading left turns to lagging left turns)
- Changes to equipment within the controller cabinet
- Changes to detection equipment
- Replacements or upgrades to existing equipment in the same location, such as pedestrian signal heads or pedestrian pushbuttons
- Addition of signal backplates or the application of retroreflective strips
- Addition or removal of adaptive signal control systems
- Addition or removal of preemption devices
- Addition of battery backup systems

# **Sections of the TCD application form**

#### Location

Describe the location of each device using one or more of the following:

- Route
- Mile marker
- Intersection
- Distance and direction from nearest intersection

A map may also be included. GPS coordinates may be provided as supplemental information.

### Operation

Describe the design and operation of each proposed device. Guidance for specific types of devices is listed below.

Note: be sure to write "see attachments" or something similar when referring to attached items.

- Traffic signals (describe the following or attach associated plan sheets)
  - Signal layout
  - Signal phasing
  - Vehicle detector locations

- Pedestrian push button locations
- Signal timings (yellow change intervals, red clearance intervals, and pedestrian change intervals)

#### School speed limit sign beacons

Specify times the beacons will be in operation (typically 30 minutes before to 15 minutes after school begins, and 15 minutes before to 30 minutes after school dismisses)

### Part-time or roll-out STOP signs

- Specify times the signs will be in operation (typically 30 minutes before to 15 minutes after school begins, and 15 minutes before to 30 minutes after school dismisses)
- Describe how the sign will be stored so it will not be visible to motorists when not in use
- Attach a sketch or a manufacturer's product sheet of the part-time or roll-out assembly

#### RRFBs

- o Specify the duration the RRFB will operate after each actuation
- Specify the type of post(s) and base(s) that will be used
- Refer to a manufacturer's product sheet or specifications, and provide as an attachment
- Identify the location of each proposed RRFB assembly and the location of the pedestrian push buttons. It is preferred that a sketch or plan sheet showing the locations is included.
- PHBs (describe the following or attach associated plan sheets)
  - Signal layout
  - Pedestrian push button locations
  - Signal timings (steady yellow change interval and pedestrian change interval)

### Community wayfinding guide signs

- Attach a drawing or sketch of each sign that shows the sign dimensions, letter heights, arrow directions, fonts, and colors
- Specify the type of post(s) and base(s) that will be used

#### Speed feedback signs

- Refer to manufacturer's product sheet or specifications, and provide as an attachment
- Specify the type of post(s) and base(s) that will be used

#### Automated enforcement equipment

- Specify what the automated enforcement equipment will be attached to. If mounted on a separate post, specify the type of post(s) and base(s) that will be used.
- For red-light running equipment, include the traffic signal's yellow change interval for each approach that will be monitored
- When separate signs will be used to warn of the presence of photo enforcement equipment, describe the location of those signs and how they will be mounted. If mounted on a separate post, specify the type of post(s) and base(s) that will be used.

### **Conditions and/or Restrictions**

Clarify which devices the applicant will own and be responsible for repairing or maintaining. Here are some example statements:

- 1. "Applicant will own and maintain both school speed limit sign beacons. Iowa DOT will own and maintain the speed limit signs and the posts."
- 2. "Applicant will own and maintain the roll-out STOP sign assembly."
- 3. "Applicant will own and maintain both RRFB assemblies, including signs and posts."
- "Applicant will own and maintain all community wayfinding sign assemblies, including posts."
- 5. "Applicant will own and maintain the stop beacon. Iowa DOT will own and maintain the STOP sign and the post."
- 6. "Applicant will own and maintain the LED border STOP sign assembly, including the post."
- 7. "Applicant will own and maintain the following:
  - Automated speed enforcement camera equipment
  - Speed camera post
  - PHOTO ENFORCED plaque
  - TRAFFIC LAWS PHOTO ENFORCED sign

Iowa DOT will own and maintain the speed limit sign and post."

- 8. "Applicant will own and maintain the following:
  - Automated red-light enforcement camera equipment
  - Red-light camera post
  - Signal Ahead warning sign assembly, including PHOTO ENFORCED plaque and post
  - TRAFFIC LAWS PHOTO ENFORCED sign"

### **Devices owned by the Department**

The Iowa DOT may choose to install and take ownership of certain devices, such as beacons, that are typically owned by a local public agency. To document these cases, the district office submits a TCD application to the Traffic and Safety Bureau for approval.

# **Updating or rescinding a TCD permit**

When changes need to be made to an existing permitted device, the applicant should submit an entirely new TCD application documenting the most current conditions. State the following at the end of the Conditions and/or Restrictions section of the application: "This voids all previous TCD applications for the same types of devices at the subject location."

In cases where the permitted device(s) are being removed permanently, the applicant should notify the appropriate district office. The district office notifies the Traffic and Safety Bureau that the TCD permit should be rescinded.

# **Revision History**

Originally issued: 07-01-2025