



Public Interest Finding

Emergency Vehicle Preemption System

25-14-007-PIF

Introduction

Traffic signal preemption equipment is currently used along many State and Municipal routes in all three regions. An emitter mounted on a priority vehicle (typically Fire Department equipment) generates an optical pulse that is sensed by a detector mounted at the signalized intersection. After receiving a valid pulse, traffic signal controller equipment ends all conflicting traffic phases and provides a green indication for the approaching priority vehicle.

Justification for Public Interest Finding

There are at least three companies that offer traffic signal preemption systems: GTT Opticom (formerly 3M), Tomar Strobecom, and EMTRAC. The equipment for these systems is not interchangeable, nor are they fully operationally compatible.

Currently GTT Opticom system is the only priority vehicle traffic signal preemption system in use within the state. Introducing another manufacturer's system into the current network would have several implications:

- In order to retain vehicle logging capabilities and support high/low preemption priority levels, each priority vehicle would have to have emitters from each of the separate systems (which are generally purchased by local government),
- Traffic signal maintenance crews would need to train for, stockpile replacement parts for, and operate and maintain each of these separate systems.
- Accommodating multiple systems would require additional equipment in signal controller cabinets, most of which existing today may not have the physical space to allow for such additional equipment, thus requiring replacement of signal controller cabinets.
- Existing monitoring software used at the Traffic Management Center (TMC) is only compatible with GTT Opticom equipment. Use of multiple systems would require purchase and training of multiple other monitoring software's (if available) and running multiple systems has a potential to lead to confusion.

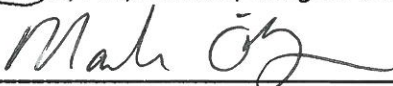
Approval of this Public Interest finding will allow for the Department to specify use of GTT's proprietary Opticom preemption system for our current design, construction, and maintenance activities.

It is hereby found to be in the best public interest, and consistent Title 23, Section 645.104(b) of the Code of Federal Regulations (CFR) and the Department of Transportation & Public Facilities Policy DPDR 10.02.013, Public Interest Finding, and DPDR 10.02.12, Force Account Construction, for the Department to allow the use of the proprietary GTT Opticom system on projects using Federal-aid highway funds.

Recommended: 

Joel G. St. Aubin, P.E., Director, Design & Construction, Alaska DOT&PF

Date: 10/24/2013

Approved: 

Mark A. O'Brien, Chief Contracts Officer, Alaska DOT&PF

Date: 10/31/13

