DATE ISSUED: March 17, 2004 REPORT NO: 04-056

ATTENTION: Honorable Mayor and City Council
Docket of March 22, 2004

SUBJECT: Red Light Photo Enforcement Program – Status Report

REFERENCE: Manager's Report Nos. 96-08, 96-136, 98-114, 02-203, 02-282

SUMMARY

THIS IS AN INFORMATION ITEM ONLY. NO ACTION IS REQUIRED ON THE PART OF THE CITY COUNCIL.

BACKGROUND

In 1996, California enacted California Vehicle Code Section 21455.5, which authorized Government entities to utilize automated photo enforcement systems at intersections.

On November 25, 2002, Council authorized the selection of the contractor to perform various tasks related to the Red Light Photo Enforcement (RLPE) Program. At that meeting Council directed staff to report on the status of the program after the fist site was operational for six months of data . The first site was operational in June, 2003.

In conjunction with the reinstatement of the Red Light Photo Enforcement Program, there have been public outreach efforts that explain the purpose and benefits of the red light cameras and answer questions from the public. As part of the public outreach effort, a brochure on the program has been published and is available for community meetings and requests from the public. Further educational efforts included the National Stop on Red week campaign that included a media event at Qualcomm Stadium, and the San Diego Police Department Safety Fair at the Miramar Air Show. On-going educational efforts include the production of a video on the RLPE program and follow-up contacts with the community groups.

A Red Light Photo Enforcement Program web page has been posted on the City of San Diego's web site. The web page includes the proposed intersections for photo enforcement. The proposed intersections are posted on the City's website for at least thirty days prior to final decision making, to allow for community input. Engineering staff respond to any questions from the public generated through the website. In addition, staff offers to attend the Community Planning Groups meeting and discuss any proposed locations.

The first site was operational in June, 2003. A total of five sites have been installed to date. Future locations identified are: 32nd Street at Harbor Drive; Garnet Avenue at Mission Bay Drive; and Grape Street at N. Harbor Drive. This report provides information as to the effectiveness of the program to date in enhancing public safety.

DISCUSSION

The contract between the City of San Diego and the vendor, Affiliated Computer Services (ACS), requires the installation of at least 15 photo enforcement systems by the end of the five year contract period, January 1, 2008. Red Light Photo Enforcement cameras are currently operating at five intersections, with three additional locations to be installed by June 30, 2004.

Traffic safety is the primary reason for utilizing photo enforcement systems. In establishing a program, collision history and collision type are evaluated for proposed intersections. Other factors evaluated include violation history, citizen and Police Department input, traffic volume (both vehicular and pedestrian), traffic speed, potential gridlock and site distribution throughout the community. Before an intersection is selected for photo enforcement, staff considers implementing engineering solutions such as additional warning systems and pavement markings, adjustments to yellow light timing and all red phasing, to enhance intersection safety. If the counter measures are not effective, the proposed intersection will be considered for photo enforcement.

Once the system is operational at a site, data is analyzed as to the change in collision history, collision type and citation history. Please note, data for twelve to twenty four months is required in order to effectively evaluate the installation. The following data represents information gathered for the limited time for which sites have been in operation.

Accident History Before and After Photo Enforcement

The overall objective of the City's photo enforcement program is to improve traffic safety at signalized intersections by reducing the number of violations and collisions attributable to red light running. Early accident data analysis indicates that the number of accidents attributable to red light running is trending downward. We are also analyzing all other types of accidents and will make modifications to improve safety as appropriate. We will continue to monitor all sites.

Table 1

Intersection	# of Days of Accident Data Since the Start of operation	Rear-End Accidents 1 Year Pre-RLPE	Rear-End Accidents Post-RLPE	Accidents due to "Red Light Violations" 1 Year Pre-RLPE	Accidents due to "Red Light Violations" Post-RLPE	All Accidents 1 Year Pre-RLPE	All Accidents Post-RLPE
"A" St / 10th Ave	165	2	0	3	0	6	1
Black Mtn. Rd / Mira Mesa	130	5	3	3	0	10	7
54th St / Montezuma Rd	68	1	1	1	0	3	2
La Jolla Village Dr / Towne Center Dr	68	4	2	2	0	9	2

Note: For the data in Table 1, reported accident records one year prior to the photo enforcement are compared to the length of time since installation.

Citation Activity

The current locations of the RLPE systems include main entrances into the downtown business district, adjacent to shopping centers, and next to a school.

The number of motorists who ran red lights since the installation of the RLPE camera system is displayed in Table 2.

Table 2

Location	# Days in Operation (Citation may be issued)	Citations Issued
"A" St. at Tenth Ave.	184	154
Black Mountain Rd. at Mira Mesa Blvd.	110	239
54th St. at Montezuma Rd.	89	63
La Jolla Village Dr. at Towne Center Dr.	89	36
Total		492

Flashing Green Light

During the Council meeting of November 25, 2002, staff was directed to investigate the use of a flashing green indication at City signalized intersections. The concept was to use the flashing green indication at the end of the solid green phase, to warn motorists of the up-coming yellow phase of the traffic signal.

The U. S. Department of Transportation, Federal Highway Administration, the agency responsible for researching and setting standards for devices, has studied the use of the flashing green and similar "countdown" concepts. It was found that these displays encouraged some drivers to unreasonably speed up to "beat the light" and the increased aggressive driving behavior caused more crashes to occur than was the case without the countdown. FHWA, through research, has conclusively shown that countdown displays reduce, rather than improve, traffic safety. Therefore, Federal Highway Administration is on record stating that these devices would not be allowed under the Manual on Uniform Traffic Control Devices. Based upon the research staff does not recommend utilizing this technology.

CONCLUSION

Preliminary data suggests that the RLPE program reduces red light running accidents and thereby improves safety. There have been no accidents due to red light running at the five sites since the photo enforcement cameras have been installed. There were nine accidents in the previous twelve months at these same locations. Nationwide, the average comprehensive costs on a per-injured person basis were $3,470,000 for a death and $172,000 for an injury. Our utilization of a Red Light Photo Enforcement Program has been worth the investment.

We will select an additional seven sites in FY05 and continue to monitor the effectiveness of the existing sites. We will return to Council with a status report on the program in the fall of 2004.

Respectfully submitted,

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