

Port Runner Suppression System (PRSS)



Introduction

The Port Runner Suppression System (PRSS) provides positive and effective traffic control at U.S. Border Lands Ports of Entry (LPOE). A port runner is a vehicle that tries to evade apprehension by forcing itself through the port without inspection. The PRSS has been successfully installed at LPOE vehicle border crossings. The system is organized in modular form and can be applied to any border crossings needing the same vehicular traffic controls.

Description

The PRSS is a modular computer-controlled traffic control system that can be configured to control any number of traffic lanes. Traffic control is progressive so that when an incident occurs the traffic passing through the port at that time is safely and quickly stopped. The PRSS deterrent features serve to reduce and eliminate the number of vehicles that may try to breach the port for any reason while providing safe passage to regular travelers.

The typical PRSS operation is as follows:

1. PRSS activation is normally caused by a Customs Inspector who encounters a vehicle trying to evade inspection. The Customs Inspector activates the system by pressing any alarm button at the inspec-

- Modular computer-controlled traffic control system
- Progressively escalating zoned stopping system
- Test programs and alarm logging

tion station. A strobe light located on the inspector booth identifies the PRSS alarm origin.

2. Each port traffic lane is normally configured with the PRSS stopping system. Each traffic lane includes a zoned stopping system as follows:
 - a. When a vehicle leaves the border customs inspection station, the vehicle enters stopping zone 1. Stopping zone 1 includes PRSS-controlled signal lights and message signs that provide warning messages in multiple languages.
 - b. Stopping zone 2 begins with mechanical lane separation barriers confining a vehicle's travel to that lane. Speed bumps are located to slow traffic in this zone. Stopping zone 2 ends with a PRSS-controlled gate arm, traffic lights and overhead message sign with flashing emergency lamps. The stopping zone 2 equipment will cause all normal vehicles to halt travel.
 - c. Stopping zone 3 ends with a PRSS-controlled tire shredder, gate arm, traffic lights and overhead message sign with flashing emergency lamps. The equipment in this stopping zone will cause vehicle tire damage designed to physically halt vehicle travel and allow apprehension.
3. PRSS operation is monitored at the central control point usually located in the main security center or Head House. The central control point provides

visual indications of all PRSS operations, including individual control of each exit lane individually. Test programs and alarm logging is accessible at the central control point.

PRSS Control Components

The PRSS is modular, meaning that the control system and field-mounted traffic control equipment can be configured to the traffic stopping requirements of any facility. The components are:

1. Control Module. The control module, PX-150-CM, includes the central controller and the interface components for interconnection to the field-mounted traffic control devices.
2. Remote Module. The remote module, PX-150-RM, accepts alarm inputs when the control module is located any great distance from the alarm input.
3. Operator Console. The operator console, PX-150-OC, is the human interface for the officers in the security control room.
4. Customs Inspector's Booth System. Each customs inspection booth includes a system of alarm button(s) and strobe lamp(s) that (1) allows the officer to report and an alarm and then (2) directs all other officers to the location of that alarm.
5. PRSS Software System. The software system, PX-150-SS, provides the application software system.

PRSS Traffic Control Components

The PRSS Traffic Control System is connected to traffic control equipment that ultimately communicates with vehicle drivers and provides stopping indicators, including one or more barriers to vehicular travel.

Typical traffic control components are:

1. Traffic Signals. Traffic signals are used in each traffic lane and at the end of each PRSS stopping zone.
2. Changeable Message Signs. Changeable message signs are capable of displaying any alphanumeric message as either traveler information or notification that a Port Runner emergency condition exists.
3. Extinguishable Message Signs. Extinguishable

messages signs provide emergency messages whenever the PRSS is activated.

4. Auto-Gate Arms. Auto-gate arms are remotely controlled gate arms that can be lowered across the lane to stop traffic.
5. Tire Shredders. Tire shredders are sharp steel teeth that, when activated, deploy the teeth upward to cut through any tires that try to cross.
6. Retractable Bollard Systems. Retractable bollards are heavy duty round metal barrier posts that are stored in the ground and deployed upward when a barrier is required.
7. Cameras. The PRSS usually includes a closed circuit video system positioned to view activities in the exit lanes and at any other gates that are part of the PRSS.
8. Public Address System. The PRSS usually includes a public address audio system that provides alarm announcements to all responding officers.
9. Signage. Signage is provided within each exit lane and in conjunction with the gate operators and tire shredders to indicate that caution is needed because severe tire damage can occur.

Engineering Services

Priax Corporation can provide engineering services in support of the PRSS design, budgetary pricing, plans and specifications, equipment procurement, installation, warranty and maintenance. Priax Corporation is a GSA contractor, and the PRSS engineering support services are available on a current GSA contract. Please contact Priax Corporation for more information.