



# Traffic Detection Options

COMPONENT OPTIONS



## DOPPLER RADAR DETECTION

The Doppler Radar Detection System detects approaching vehicles moving at speeds as slow as 2.5 mph (4 km/h). The Doppler Radar Detector mounts directly to the Signal System and is easily adjusted to maximize the detection zone. It is equipped with an LED indicator to provide visual confirmation of detection. The Doppler Radar Detector has a rugged housing with an operating temperature range of -40° to 158° F (-40° to 70° C).



## PRE-EMPTION DETECTION

The Pre-emption Detection System provides a green phase in the direction of an approaching emergency vehicle. Indication lights will confirm the system is functioning. Actuation is accomplished through optical communication.



## VIDEO DETECTION

The Video Detection System provides true presence detection and can be configured with multiple directional detection zones. The Video Detection Camera mounts directly to Horizon Signal Systems, and does not require a laptop computer for setup. The non-intrusive installation and configuration is accomplished quickly and efficiently.



## LOOP DETECTION

Horizon Signal Systems can be equipped with a Loop Detection Module to facilitate the use of existing, new or temporary loops. The Loop Detection Module provides true presence detection and features adjustable sensitivity, self-tuning and detection indicator. The Loop Detection Module can accommodate multiple loops.

### Traffic Actuation Comparison Chart

	<i>Doppler Radar</i>	<i>Pre-Emption</i>	<i>Loops</i>	<i>Video</i>
Installation	Easy / Fast	Easy / Fast	Difficult / Slow	Easy / Fast
Configuration	Easy / Indiscriminate	Easy / Indiscriminate	Easy / Precise	Easy / Precise
Verification of Detection	Onboard LED	Onboard LED	Onboard LED	Visual w/ Laptop
Number of Detection Zones	1	1	1	Up to 8
Number of Traffic Lanes	1	1	1	4
Detection Sensitivity	Moving Only	Optical	Moving / Stopped	Moving / Stopped
Operating Temperature Range	-40° to +158° F -40° to +70° C	-35° to +165° F -37° to +75° C	n/a	n/a

Traffic detection modules are used to recognize vehicles entering a pre-designated zone(s). This information is transmitted to the signal controller which coordinates signal operation. Signals which have been actuated via the detection module will be provided a green indication in the order of detection occurrence or in the order of pre-programmed priority. The signal controller can be programmed to provide minimum and varying green times based on vehicle presence up to a pre-programmed maximum green time. Horizon Portable Signal Systems can also be programmed to rest in red until vehicles enter the detection zone. This type of programming combined with the varying green time based on vehicle presence ensures the most efficient traffic flow.

### DISTRIBUTED BY



General specifications for traffic detection options are subject to change without notice to reflect improvements and upgrades. Additional information is available. Contact Horizon Signal Technologies for details.

#### Regional Distribution Centers

Philadelphia, PA | Birmingham, AL | Chicago, IL | Indianapolis, IN | Waco, TX | Phoenix, AZ | St. Catharines, ON

#### Horizon Signal Technologies

5 Corporate Blvd | Reading, PA 19608 | U.S. Toll Free (800) 852-8796

[www.horizonsignal.com](http://www.horizonsignal.com)