

The benefits of TSP for a transit system are that the on-time performance of operations is enhanced because the random delays associated with signal operations are reduced.

A transit signal priority (TSP) system is technology that can extend the green phase of a traffic signal or can turn the signal green earlier than scheduled so that a bus may pass through an intersection more quickly. By giving signal priority to transit buses, transit travel times and delay times are shortened, translating into more convenience to the passengers and cost savings for the agency. Three types of logic exist to implement the use of this technology, the NY 5 BRT will use:

- Active conditional which involves a determination either by the TSP equipment on the transit vehicle or in the signal controller on whether to grant priority based on factors such as the on-time/late status of the vehicle, whether its door is open, and/or the position of the signal phasing plan at the time the vehicle arrives.