

Abby Lodge Quito Bus System

Prior to 1996, the bus system in Quito provided poor services for the passengers, was old, poorly maintained, and caused emission and noise problems. An efficient, affordable, “clean” public transport option was sought to address public discontent and to prevent further damage to the historic city. The busway-based Trolebus System was implemented in two stages; the first in 1996 and the second, an extension in the south, was commenced in 1999 and has been in operational since June 2000.

The Quito Trolebus System uses electrically-powered trolleybuses and operates on a segregated busway located in the center of a wide arterial road over the majority of its length. The busway operates as a trunk-and-feeder system in which passengers pay on entry to the system and are able to transfer between feeder and trunk line buses without further fare payment. Bus stops are island platforms and the articulated trunk line trolleybuses are high floor vehicles but level, gap-less boarding for passengers is achieved at stops through raised stop platforms (accessed by ramps) and fold down steps from bus doors onto the stop platform. I think it is a really good idea to have the buses and trolleys separated by a median – it would probably reduce the amount of accidents (with pedestrians or the bus) from cars trying to go around buses or situations in which the buses could not see cars.

In most parts of the busway, there is a special police group that enforces the physical separation that helps to maintain its exclusive use by trolley buses. Taxis are not permitted in the busway and remain with the general traffic. Cycles are not permitted in the busway and also remain with the general traffic.

A fundamental change in the transport law was key to achieve the successful planning and operation of the Quito busway based Trolebus system. In the mid-1990s, after two years of lobbying, the Ecuadorian Congress approved a law making the Municipality responsible for “the planning, regulation, and co-ordination of all matters related to public and private transport.” This law consolidated responsibilities, previously in the remit of a number of agencies, under a single agency and is the foundation on which the Quito scheme is based. The Trolebus System’s fare box revenue in 2000 was reported at US\$ 10.5 million, covering the full system operating and maintenance costs including the feeder services.

The bus system is said to have a maximum capacity is about 180 passengers per vehicle – I feel as though a standard American bus holds maybe 40 to 60 people? So, it will be interesting to see 180 people on one bus. On average, the daily trolleybus occupancy is 3500 passengers/vehicle/day. The busway based Trolebus System has positive environmental impacts that include: reduced emissions per bus-km since the trolley buses are electric; major trunk line passenger movements to/from the center of the city are catered for with considerably fewer buses than previously; there has been an increase in car operating speeds due to the absence of old buses stopping everywhere, which led to an increased capacity in the traffic lanes; and there is anecdotal evidence that some car-bus mode transfer may have taken place.